

TYPE SPECIMENS OF FISHES IN THE TULANE UNIVERSITY MUSEUM OF NATURAL HISTORY

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INTRODUCTION

This type list is being published in accordance with Recommendation 72G of the International Code of Zoological Nomenclature (3rd Edition), which encourages institutions housing name-bearing types to periodically publish listings of those types. This is the second listing of types of fishes in the Tulane University Museum of Natural History, and is intended to update the first list, published 23 years ago (Suttkus, 1970). That first list included a history of the Tulane fish collection, which is briefly updated here to provide information on the status of the collection and its curation.

At the time of publication of the first type list, the fish collection, including the type collection, was in the process of being moved to the F. Edward Hebert ("Riverside") Research Laboratories on the west bank of the Mississippi River near Belle Chasse (15 miles from Tulane's main campus in New Orleans). The Systematics and Environmental Biology Laboratory, the facility that initially incorporated the fish collection, was formally established in 1971. In 1976, Royal D. Suttkus, the collection's founder and first Curator, convinced the Tulane University administration to designate systematic collections at Riverside as the Tulane University Museum of Natural History.

Suttkus retired from Tulane University in 1990, but continues to work in the collection in his present capacity as Emeritus Curator. Also in 1990, the Biology Department at Tulane was reorganized. The Museum is presently administered through the Department of Ecology, Evolution, and Organismal Biology, Milton Fingerman, Chair. The senior author was hired as Curator of Fishes and Director of the Museum in 1992. The junior author was hired as Collection Manager also in 1992.

Zoological collections in the Museum of Natural History are currently housed in four of 26 World War II-vintage ammunition bunkers on the Riverside campus. The fish collection is largely contained in Bunker A-3 near the rear of the complex, but overflows into parts of two additional bunkers (A-2 and A-14). The fish collection has been expanding at a rate of 4500 lots and 200,000 specimens per year. As of August 1992, it contained 6,137,652 fluid-preserved specimens cataloged in 163,469 lots (an average of 37.5 specimens per lot). In addition, there is an osteological collection with 1352 specimens, of which 638 are cleared and stained preparations; there are 2010 radiographs representing 21,988 specimens; and there are 2428 scale and otolith samples

TYPE COLLECTION

Type material is housed in a separate 104 sq. ft. room in the main fish collection bunker. The arrangement of material on the shelves follows Berg

(1940). At present, the type collection includes 33 holotypes and 38,835 paratypes representing 125 fish species. All but the largest type specimens are stored in glass jars of the highest quality. The necks of jars containing holotypes are painted red, those of jars containing paratypes are painted blue. Types of *Scaphirhynchus suttkusi* are kept in a stainless steel tank in the type room. Paratypes of *Ophichthus rex* are stored in an eight ft. wooden tank in the fish range. Also in the type room is a file of all original literature, and a color-coded card file with data on types and original literature arranged chronologically and phylogenetically. The type room also houses two specimens of the extinct harelip sucker, *Lagochila lacera*, on permanent loan from Cornell University, as well as specimens of certain rare or Federally endangered species.

Types of the Tulane fish collection are listed below in Berg family order. Each listing includes the original species name, author(s), year of publication and page on which species name appears, and list of types. Complete citations for the original descriptions are provided in the literature cited. The holotype is listed first if present. Paratypes collected with the holotype are always the first entry in the paratype listings; remaining paratypes are listed by increasing catalog number, which approximates a chronological listing. The complete collection record is provided in all instances except listings of paratypes collected with listed holotypes. Any corrections, information of the status of types, and other information updating Suttkus (1970) are given in parentheses at the end of the listing. Institutional abbreviations follow Leviton et al. (1985).

LIST OF TYPE SPECIMENS Acipenseridae

Scaphirhynchus suttkusi Williams & Clemmer, 1991: 19.

HOLOTYPE: TU 135000, from Alabama, Monroe Cnty., oxbow lake of Tensaw R. just above Little R., 18 March 1977, GHC 1411, collected by W. E. Smith.

PARATYPES: TU 50553, 1 specimen from Alabama, Monroe Cnty., Alabama R. at Bear Cr., river mi. 112.8, 2 March 1968, RDS 4295, collected by J. Gaddy (fisherman); **TU 52868**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Clifton Ferry Landing, river mi. 137.3, 29 June 1968, collected by R. D. Suttkus; **TU 64937**, 1 specimen from Alabama, Perry Cnty., Cahaba R. near Marion fish hatchery, 1 mi. W of Sprott, 30 April 1966, collected by Green; **TU 135001**, 1 specimen from Alabama, Monroe Cnty., overflow lake of Tensaw R. just above mouth of Little R., 5 April 1977, GHC 1412, collected by W. E. Smith (incorrectly listed as TU 350001 in description).

Clupeidae

Brevoortia gunteri Hildebrand, 1948: 31.

PARATYPE: TU 10792, 1 specimen from Texas, Aransas Cnty., Aransas Bay, collected by G. Gunter (formerly USNM 129802).

Sudidae (= Chlorophthalmidae)

Chlorophthalmus brasiliensis Mead, 1958: 362.

PARATYPES: **TU 18374**, 4 specimens from Atlantic Ocean, 01°49'N, 46°48'W, 225 fms., 17 November 1958, Oregon Sta. 2083, collected by crew of M/V Oregon (inadvertently omitted from Suttkus, 1970).

Alepisauridae

Alepisaurus brevirostris Gibbs, 1960: 2.

PARATYPE: **TU 22990**, 1 specimen from Atlantic Ocean, 37°44'N, 65°42'W, 1957, collected by crew of M/V Delaware.

Characidae

Astyanax armandoi Lozano & Contreras, 1990: 97.

PARATYPES: **TU 157268**, 2 specimens from Chiapas, México, unnamed creek flowing through Pénjamo, near Palenque, 7 May 1980, MLLV 80-33, collected by M. L. Lozano (removed from UANL 6202).

Hysteronotus myersi Thomerson & Weitzman, 1970: 140.

PARATYPES: **TU 56456**, 2 specimens from Huanuco, Peru, descendents of specimens collected from a small creek near Tournavista, 23 August 1964, collected by J. E. Thomerson and party.

Cyprinidae

Algansea aphanes Barbour & Miller, 1978: 21.

PARATYPES: **TU 105478**, 10 specimens from Jalisco, México, Río de Ayutla 6.1 mi. W of junction Mascota Rd. and México Hwy. 80 and 3 mi. SE of Ayutla, 22 April 1969, collected by C. D. Barbour and R. J. Douglas (removed from UMMZ 192196).

Algansea monticola Barbour & Contreras, 1968: 101.

HOLOTYPE: **TU 40869**, from Zacatecas, México, Río Juchipila near town of Jalpa, at México Hwy. 70 bridge, one mi. E of the intersection with México Hwy. 41, 30 June 1963, CDB 63-27, collected by C. D. Barbour and S. Contreras.

PARATYPES: **TU 30611**, 49 specimens collected with holotype; **TU 30608**, 76 specimens from Zacatecas, México, Río Juchipila at Mal Paso (a little walled town) about 16 mi. E of Ciudad García Salinas, 28 June 1963, CDB 63-23, collected by C. D. Barbour and S. Contreras; **TU 30609**, 131 specimens from Zacatecas, México, tributary to Río Juchipila, about 5 mi. S of Villanueva on México Hwy. 41, 28 June 1963, CDB 63-24, collected by C. D. Barbour and S. Contreras; **TU 30610**, 18 specimens from Zacatecas, México, Río Juchipila at Tabasco, upstream of bridge at south end of town, 29 June 1963, CDB 63-25, collected by C. D. Barbour and S. Contreras.

Algansea monticola avia Barbour & Miller, 1978: 10.

PARATYPES: **TU 30816**, 20 specimens from Nayarit, México, Río Tepic at México Hwy. 15, 27 mi. SE of Tepic, 1957, M57-12, collected by R. R. Miller and assistants; **TU 30817**, 13 specimens from Nayarit, México, Arroyo de Mazatán at Mazatán, 1955, M55-25, collected by R. R. Miller and assistants; **TU 30818**, 15 specimens from Nayarit, México, Río Compostela just S of Compostela, 1955, M55-40, collected by R. R. Miller and assistants.

Campostoma pauciradii Burr & Cashner, 1983: 105.

HOLOTYPE: **TU 117030**, from Georgia, Hall Cnty., Candler Cr., 1.1 mi. W of Gillsville, Georgia Hwy. 52, 24 April 1980, RDS 7314, collected by R. D. Suttkus, D. C. Scott, F. Myers, and S. Larson.

PARATYPES: **TU 117031**, 5 specimens collected with holotype; **TU 26138**, 1 specimen from Georgia, Gwinnett Cnty., Yellow R. 7 mi. E of Duluth, Georgia Hwy. 120, 20 April 1962, RDS 3057, collected by R. D. Suttkus, J. S. Ramsey, J. E. Thomerson, and C. D. Barbour (incorrectly listed as TU 25138 in description); **TU 30489**, 5 specimens from Georgia, Hall Cnty., North Oconee R. 5.9 mi. NE of Gainesville, U.S. Hwy. 23, 22 September 1963, JSR 63-47, collected by J. S. Ramsey; **TU 30499**, 3 specimens from Georgia, Hall Cnty., East Fork Oconee R. about 2 mi. N of Gillsville, Georgia Hwy. 52, 22 September 1963, JSR 63-48, collected by J. S. Ramsey; **TU 41351**, 10 specimens from Georgia, Hall Cnty., Flat Shoals Cr., at Georgia Hwy. 52 crossing, 1 mi. W of junction of Georgia Hwy. 323, 4 May 1966, GHC 440, collected by G. H. Clemmer and J. Reed; **TU 114877**, 25 specimens from Georgia, Hall Cnty., Candler Cr., 1.2 mi. W of Gillsville, Georgia Hwy. 52, 12 October 1979, RDS 7157, collected by R. D. Suttkus, R. C. Cashner, R. Gilbert, and A. R. Heidt; **TU 116945**, 1 specimen from Georgia, Hall Cnty., Candler Cr., 1.1 mi. W of Gillsville, Georgia Hwy. 52, 1 April 1980, RDS 7307, collected by R. D. Suttkus and B. J. Freeman; **TU 116956**, 3 specimens from Georgia, Hall Cnty., Candler Cr., 2 air mi. NW of Gillsville, 1 April 1980, RDS 7308, collected by R. D. Suttkus and B. J. Freeman; **TU 116964**, 5 specimens from Georgia, Hall Cnty., North Oconee R., 2.8 mi. W of U.S. Hwy. 23, along Whitehall Rd., 1 April 1980, RDS 7309, collected by R. D. Suttkus and B. J. Freeman; **TU 117042**, 13 specimens from Georgia, Hall Cnty., North Oconee R., 2.8 mi. W of U.S. Hwy. 23, along Whitehall Rd., 24 April 1980, RDS 7315, collected by R. D. Suttkus, D. C. Scott, F. Myers, and S. Larson.

Dionda mandibularis Contreras & Verduzco, 1977: 259.

PARATYPES: **TU 94115**, 2 specimens from San Luis Potosí, México, Arroyo, 7 km SSE of the town of Río Verde, 14 July 1968, SCB 68-16, collected by S. Contreras and party (removed from UANL 1032).

Gila bicolor eury soma Williams & Bond, 1981: 223.

HOLOTYPE: **TU 116230**, from Nevada, Washoe Cnty., Fish Cr., approximately 0.8 km upstream from Andy's Place, 11 August 1978, JW 78-32, collected by J. E. Williams and C. Williams.

PARATYPES: **TU 116231**, 11 specimens collected with holotype.

Gila boraxobius Williams & Bond, 1980: 292.

PARATYPES: **TU 116232**, 8 specimens from Oregon, Harney Cnty., Hot Lake (= Borax Lake), 5 mi. N of Fields, 30 July 1972, collected by C. E. Bond (removed from OS 4138).

Hybopsis lineapunctata Clemmer & Suttkus, 1971: 22. (= *Notropis lineapunctatus*)

HOLOTYPE: **TU 53405**, from Alabama, Clay Cnty., Enitachope Cr., tributary to Hillabee Cr., 2.9 mi. SW of Ashland, Alabama Hwy. 9, 13 April 1966, RDS 3877, collected by R. D. Suttkus and G. H. Clemmer.

PARATYPES: **TU 40643**, 46 specimens collected with holotype; **TU 12085**, 8 specimens from Alabama, Elmore Cnty., Gold Branch, 6 mi. N of Eclectic, Alabama Hwy. 63, 5 October 1955, RDS 2525, collected by R. D. Suttkus; **TU 15281**, 156 specimens from Alabama, Elmore Cnty., Gold Branch, tributary to Channahatchee Cr., 6 mi. N of Eclectic, Alabama Hwy. 63, 16 March 1957, RDS 2592, collected by R. D. Suttkus, R. J. Miller, H. V. Miller, and J. DeAbate; **TU 29884**, 1 specimen from Alabama, Clay Cnty., Enitachope Cr., tributary to Hillabee Cr., 3.2 mi. SW of Ashland, Alabama Hwy. 9, 21 September 1963, JSR 63-46, collected by J. S. Ramsey; **TU 32729**, 8 specimens from Alabama, Clay Cnty., Enitachope Cr., 2.9 mi. S of Ashland, Alabama Hwy. 9, 1 June 1964, RDS 3462, collected by R. D. Suttkus and J. S. Ramsey; **TU 40668**, 12 specimens from Alabama, Randolph Cnty., tributary to Little Tallapoosa R., 2.9 mi. W of intersection of U.S. Hwy. 431 and Alabama Hwy. 82, 13 April 1966, RDS 3878, collected by R. D. Suttkus and G. H. Clemmer; **TU 41118**, 28 specimens from Alabama, Elmore Cnty., Gold Branch, tributary to Tallapoosa R., 6 mi. N of Eclectic, Alabama Hwy. 63, 12 April 1966, RDS 3873, collected by R. D. Suttkus and G. H. Clemmer; **TU 41132**, 1 specimen from Alabama, Elmore Cnty., Channahatchee Cr., tributary to Tallapoosa R., 2.5 mi. S of Red Hill, Alabama Hwy. 229, 12 April 1966, RDS 3874, collected by R. D. Suttkus and G. H. Clemmer.

Nocomis asper Lachner & Jenkins, 1971b: 3.

PARATYPES: **TU 48547**, 9 specimens from Arkansas, Benton Cnty., Spavinaw Cr. hole no. 3, 10 June 1966, University of Arkansas graduate students; **TU 48613**, 28 specimens from Arkansas, Benton Cnty., Spavinaw Cr. hole no. 2, 10 June 1966, University of Arkansas graduate students; **TU 48658**, 14 specimens from Arkansas, Benton Cnty., Spavinaw Cr. hole no. 4, 10 June 1966, University of Arkansas graduate students.

Nocomis effusus Lachner & Jenkins, 1967: 560.

PARATYPES: **TU 19488**, 2 specimens from Tennessee, Rutherford Cnty., Stones R., 6.5 mi. N of Murfreesboro, U.S. Hwy. 231, 7 September 1958, RDS 2758, collected by R. D. Suttkus and M. Andersson; **TU 32838**, 5 specimens from Tennessee, Fentress Cnty., tributary to Wolf R., 9.8 mi. N of Jamestown, U.S. Hwy. 127, 3 June 1964, RDS 3474, collected by R. D. Suttkus and J. S. Ramsey; **TU 33115**, 2 specimens from Tennessee, Cheatham Cnty., Harpeth R., 8 mi. E of White Bluff, U.S. Hwy. 70, 15 July 1964, JSR 64-60, collected by J. S. Ramsey and D. W. Walton; **TU 33125**, 11 specimens from Tennessee, Williamson Cnty., South Harpeth R., 4.2 mi. E of Fairview, Tennessee Hwy. 96, 15 July

1964, JSR 64-61, collected by J. S. Ramsey and D. W. Walton; **TU 33171**, 21 specimens from Tennessee, Rutherford Cnty., West Fork Stones R. at W edge of Murfreesboro, Tennessee Hwy. 96, 15 July 1964, JSR 64-63, collected by J. S. Ramsey and D. W. Walton; **TU 33194**, 1 specimen from Tennessee, Rutherford Cnty., Stones R. at S limit of Walterhill, U.S. Hwy. 231, 16 July 1964, JSR 64-64, collected by J. S. Ramsey and D. W. Walton.

Nocomis leptcephalus interocularis Lachner & Wiley, 1971: 6.

PARATYPES: **TU 12231**, 6 specimens from Georgia, Rabun Cnty., Timspon Cr., 5.4 mi. W of Clayton, U.S. Hwy. 76, 8 October 1955, RDS 2533, collected by R. D. Suttikus and party; **TU 26178**, 11 specimens from Georgia, Madison Cnty., South Fork Broad R., 1 mi. W of Comer, Georgia Hwy. 72, 21 April 1962, RDS 3061, collected by R. D. Suttikus, J. S. Ramsey, J. E. Thomerson, and C. D. Barbour; **TU 26181**, 19 specimens from Georgia, Madison Cnty., South Fork Broad R., 1 mi. S of Carlton, 21 April 1961, RDS 3062, collected by R. D. Suttikus, J. S. Ramsey, J. E. Thomerson, and C. D. Barbour; **TU 26190**, 30 specimens from South Carolina, Anderson Cnty., tributary to Savannah R. 5 mi. W of Iva, South Carolina Hwy. 184, 21 April 1962, RDS 3063, collected by R. D. Suttikus, J. S. Ramsey, J. E. Thomerson, and C. D. Barbour; **TU 26955**, 12 specimens from South Carolina, Oconee Cnty., Little R. 8 mi. NE of Walhalla on South Carolina Hwy. 11, 5 July 1962, JSR 62-117, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 26971**, 5 specimens from South Carolina, Oconee Cnty., Thompson R., tributary to Whitewater R., 1.4 mi. S of South Carolina-North Carolina state line in Sumter National Forest, 10 July 1962, JSR 62-122, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 26974**, 5 specimens from South Carolina, Oconee Cnty., Chauga R. 15.9 mi. S of Georgia-South Carolina state line on South Carolina Hwy. 28, 13 July 1962, JSR 62-136, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 26979**, 1 specimen from Georgia, Rabun Cnty., and South Carolina, Oconee Cnty., Chattooga R. at Georgia-South Carolina state line, South Carolina Hwy. 28 above junction with West Fork, 13 July 1962, JSR 62-135, collected by J. S. Ramsey, W. S. Woolcott, H. H. Howell, and D. H. Howell; **TU 26996**, 6 specimens from South Carolina, Pickens/Oconee Cnty. line, confluence of Horsepasture and Toxaway rivers, 1.5 mi. S of North Carolina-South Carolina state line, 21 July 1962, JSR 62-152, collected by J. S. Ramsey and H. H. Howell; **TU 27001**, 34 specimens from North Carolina, Transylvania Cnty., Bearcamp Cr., tributary to Horsepasture R., 4.0 mi. S of Oakland, 24 July 1962, JSR 62-155, collected by J. S. Ramsey and H. H. Howell; **TU 28017**, 2 specimens from North Carolina, Jackson Cnty., tributary to Chattooga R. 1.7 mi. S of Cashiers, North Carolina Hwy. 107, 4 June 1962, JSR 62-67, collected by J. S. Ramsey and W. S. Woolcott; **TU 28023**, 15 specimens from North Carolina, Transylvania Cnty., Horsepasture R., tributary to Toxaway R., 0.5 mi. N of North Carolina-South Carolina state line, 6 June 1962, JSR 62-72, collected by J. S. Ramsey and W. S. Woolcott; **TU 29261**, 5 specimens from North Carolina, Transylvania Cnty., Bearwallow Cr. near confluence with Toxaway R., 1.9 mi. due N of North Carolina-South Carolina state line, 7 June 1962, JSR 62-73, collected by J. S. Ramsey and W. S. Woolcott; **TU 29288**, 11 specimens from North Carolina, Transylvania Cnty., Bearwallow Cr. at confluence with Toxaway R., 2 mi. due N of South Carolina state line, 10 June 1962, JSR 62-79, collected by J. S. Ramsey and W. S. Woolcott; **TU 29303**, 5 specimens from North Carolina, Transylvania Cnty., Horsepasture

R. 1.1 mi. S of Oakland on Sapphire Rd., 14 June 1962, JSR 62-81, collected by J. S. Ramsey and W. S. Woolcott; **TU 29309**, 21 specimens from North Carolina, Transylvania Cnty., Toxaway R. above Lake Toxaway, 2.6 mi. W of Lake Toxaway (town) on gravel road, 15 June 1962, JSR 62-88, collected by J. S. Ramsey and W. S. Woolcott; **TU 29314**, 10 specimens from North Carolina, Transylvania Cnty., Horsepasture R., 2.5 mi. S of Oakland on Whitewater Rd., 18 June 1962, JSR 62-90, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 29319**, 7 specimens from North Carolina, Transylvania Cnty., Horsepasture R., 3 mi. S of Oakland on gravel road, 18 June 1962, JSR 62-91, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 29322**, 9 specimens from Georgia, Habersham Cnty., Panther Cr., tributary to Tallulah R. 3.9 mi. SW of Tallulah Falls, U.S. Hwy. 441, 19 June 1962, JSR 62-92, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 29329**, 24 specimens from Georgia, Rabun Cnty., Tallulah R. 1.5 mi. S of Wiley, U.S. Hwy. 441, 19 June 1962, JSR 62-93, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 29391**, 12 specimens from North Carolina, Transylvania Cnty., Bearcamp Cr., tributary to Horsepasture R., 4.0 mi. S of Oakland, 25 June 1962, JSR 62-103, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 29420**, 8 specimens from North Carolina, Transylvania Cnty., Bearcamp Cr., tributary to Horsepasture R., 0.2 mi. N of South Carolina state line, 28 June 1962, JSR 62-107, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 29422**, 2 specimens from North Carolina, Transylvania Cnty., Bearwallow Cr., tributary to Toxaway R., below 60 ft. falls, 1.7 mi. N of South Carolina state line, 29 June 1962, JSR 62-108, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 29436**, 3 specimens from North Carolina, Transylvania Cnty., Horsepasture R. between Drift Falls and Rainbow Falls, 2.6 mi. SW of Oakland, 3 July 1962, JSR 62-110, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 29449**, 6 specimens from North Carolina, Transylvania Cnty., Toxaway R. just below Toxaway Falls, Hwy. 64, 7 July 1962, JSR 62-118, collected by J. S. Ramsey and W. S. Woolcott; **TU 29450**, 1 specimen from North Carolina, Transylvania Cnty., Toxaway R. above Lake Toxaway, 2.6 mi. West of Lake Toxaway (town) on gravel road, 2 July 1962, JSR 62-119, collected by J. S. Ramsey and W. S. Woolcott; **TU 29461**, 2 specimens from South Carolina, Oconee Cnty., Bearcamp Cr. near junction with Horsepasture R., 0.5 mi. SE of North Carolina state line, 10 July 1962, JSR 62-123, collected by J. S. Ramsey, W. S. Woolcott, and H. H. Howell; **TU 29534**, 11 specimens from North Carolina, Transylvania Cnty., Toxaway R. above Lake Toxaway, 2.6 mi. W of Lake Toxaway (town) on gravel road, 14 July 1962, JSR 62-138, collected by J. S. Ramsey, H. H. Howell, D. H. Howell, and W. C. Howell; **TU 29585**, 13 specimens from South Carolina, Pickens-Oconee Cnty. line, Toxaway R. 0.25 mi. S of junction with North Carolina state line, 23 July 1962, JSR 62-154, collected by J. S. Ramsey and H. H. Howell; **TU 29599**, 27 specimens from North Carolina, Transylvania Cnty., Toxaway Cr., tributary to Toxaway R., about 3 mi. due SW of Rosman, gravel road, 31 July 1962, JSR 62-157, collected by J. S. Ramsey and H. H. Howell; **TU 29652**, 5 specimens from North Carolina, Jackson Cnty., Chattooga R. 2.7 mi. due S of Cashiers, gravel road, 7 August 1962, JSR 62-169, collected by J. S. Ramsey; **TU 29784**, 12 specimens from North Carolina, Transylvania Cnty., Bearcamp Cr., tributary to Horsepasture R., 4.0 mi. S of Oakland, 27 August 1962, JSR 62-198, collected by J. S. Ramsey; **TU 37510**, 65 specimens from Georgia, Banks Cnty., Hudson R., tributary to Broad R. about 2 mi. N of Homer, U.S. Hwy 441, 24 April 1965, RDS

3656, collected by R. D. Suttkus and F. L. Rose; **TU 38588**, 9 specimens from Georgia, Columbia Cnty., Little Kiokee Cr., 10.5 mi. N of Evans, 27 June 1965, FLR 1, collected by F. L. Rose and J. L. Rose; **TU 38597**, 3 specimens from Georgia, Richmond Cnty., Rays Cr. at crossing of Walton Way extension in Augusta, 5 July 1965, FLR 2, collected by F. L. Rose and J. L. Rose; **TU 38605**, 2 specimens from Georgia, Richmond Cnty., Rays Cr. at crossing of Barkman Rd. in Augusta, 6 July 1965, FLR 3, collected by F. L. Rose, J. L. Rose, and W. T. Rose; **TU 38613**, 15 specimens from South Carolina, McCormick Cnty., Stevens Cr. 1.4 mi. N of Parksville, Cnty. Rd. S33-21, 7 July 1965, FLR 4, collected by F. L. Rose, J. L. Rose, and W. T. Rose; **TU 38623**, 4 specimens from South Carolina, Edgefield Cnty., tributary to Stevens Cr., 4.6 mi. E of Parksville, Cnty. Rd. S33-138, 7 July 1965, FLR 5, collected by F. L. Rose, J. L. Rose, and W. T. Rose; **TU 39477**, 9 specimens from South Carolina, Edgefield Cnty., Log Cr. at U.S. Hwy. 25 crossing, 4 mi. N of U.S. Hwy. 25-25A intersection, just N of Edgefield, 25 October 1965, GHC 366, collected by G. H. Clemmer and F. L. Rose; **TU 39486**, 2 specimens from Georgia, Columbia Cnty., Little Kiokee Cr., 10.5 mi. N of Evans on dirt road, 26 October 1965, GHC 367, collected by G. H. Clemmer and F. L. Rose.

Nocomis platyrhynchus Lachner & Jenkins, 1971a: 37.

PARATYPES: **TU 25902**, 17 specimens from North Carolina, Ashe Cnty., South Fork New R., 4 mi. SW of Scottville, U.S. Hwy. 221, 19 June 1962, RDS 3109, collected by R. D. Suttkus and M. M. May.

Nocomis raneyi Lachner & Jenkins, 1971a: 17.

PARATYPES: **TU 25885**, 3 specimens from Virginia, Roanoke Cnty., Roanoke R., 8 mi. SW of Salem, U.S. Hwy. 11, 18 June 1962, RDS 3107, collected by R. D. Suttkus and M. M. May.

Notropis aguirrepequenoi Contreras & Rivera, 1973: 259.

PARATYPES: **TU 94116**, 20 specimens from Tamaulipas, México, Río Pilón at México Hwy. 85, 21 May 1966, SCB 66-8, collected by S. Contreras and party (removed from UANL 1137).

Notropis ammophilus Suttkus & Boschung, 1990: 50.

HOLOTYPE: **TU 151630**, from Alabama, Dallas-Wilcox Cnty. line, Chilatchee Cr., 0.4 mi. N of Alberta, Alabama Hwy. 5, 9 April 1988, RDS 9534, collected by R. D. Suttkus.

PARATYPES: **TU 151631**, 124 specimens collected with holotype; **TU 60871**, 1147 specimens from Alabama, Dallas-Wilcox Cnty. line, Chilatchee Cr., 0.4 mi. N of Alberta, Alabama Hwy. 5, 18 December 1969, RDS 4709, collected by R. D. Suttkus and R. C. Cashner; **TU 121386**, 129 specimens from Alabama, Dallas-Wilcox Cnty. line, Chilatchee Cr. 0.4 mi. N of Alberta, Alabama Hwy. 5, 15 May 1981, RDS 7553, collected by R. D. Suttkus; **TU 125388**, 292 specimens from Alabama, Dallas-Wilcox Cnty. line, Chilatchee Cr. 0.4 mi. N of Alberta, Alabama Hwy. 5, 15 May 1982, RDS 7857, collected by R. D. Suttkus and D. W. Stein; **TU 140934**, 207 specimens from Alabama, Dallas-Wilcox Cnty. line, Chilatchee

Cr. 0.4 mi. N of Alberta, Alabama Hwy. 5, 24 May 1985, RDS 8770, collected by R. D. Suttkus; **TU 145519**, 117 specimens from Alabama, Dallas-Wilcox Cnty. line, Chilatchee Cr. 0.4 mi. N of Alberta, Alabama Hwy. 5, 20 May 1986, RDS 9030, collected by R. D. Suttkus; **TU 153083**, 98 specimens from Alabama, Dallas-Wilcox Cnty. line, Chilatchee Cr. 0.4 mi. N of Alberta, Alabama Hwy. 5, 2 August 1988, RDS 9656, collected by R. D. Suttkus; **TU 153185**, 296 specimens from Alabama, Dallas-Wilcox Cnty. line, Chilatchee Cr. 0.4 mi. N of Alberta, Alabama Hwy. 5, 3 August 1988, RDS 9661, collected by R. D. Suttkus; **TU 154399**, 25 specimens from Alabama, Dallas-Wilcox Cnty. line, Chilatchee Cr. 0.4 mi. N of Alberta, Alabama Hwy. 5, 3 February 1989, RDS 9768, collected by R. D. Suttkus; **TU 154734**, 19 specimens from Alabama, Dallas-Wilcox Cnty. line, Chilatchee Cr. 0.4 mi. N of Alberta, Alabama Hwy. 5, 9 May 1989, RDS 9799, collected by R. D. Suttkus.

Notropis asperifrons Suttkus & Raney, 1955c: 4.

PARATYPES: **TU 2974**, 22 specimens from Alabama, Wilcox Cnty., Gravel Cr. tributary to Pursley Cr., 6.3 mi. S of Camden, Hwy. 11, 3 June 1951, RDS 2140, collected by R. D. Suttkus and C. D. Hancock; **TU 3063**, 5 specimens from Alabama, Wilcox Cnty., tributary to Pursley Cr., 1.8 mi. E of Camden, Alabama Hwy. 10, 3 June 1951, RDS 2138, collected by R. D. Suttkus and C. D. Hancock; **TU 3426**, 8 specimens from Alabama, Wilcox Cnty., Pursley Cr., tributary to Alabama R., 3.4 mi. SW of Camden, Hwy. 11, 3 June 1951, RDS 2139, collected by R. D. Suttkus and C. D. Hancock; **TU 4251**, 28 specimens from Alabama, Shelby Cnty., tributary to Waxahatchee Cr., 4.7 mi. SW of Columbiana on Alabama Hwy. 25, 15 June 1952, RHG 356, collected by R. H. Gibbs and P. P. Caswell; **TU 97113**, 5 specimens from Georgia, Murray Cnty., tributary to Holly Cr. at Ramhurst, 8 mi. N of the Murray Cnty. line, U.S. Hwy. 411, 12 June 1952, RHG 342, collected by R. H. Gibbs and P. P. Casell (removed from CU 28263).

Notropis atrapiculus Snelson, 1972: 58. (= *Lythrurus atrapiculus*)

PARATYPES: **TU 2509**, 36 specimens from Alabama, Houston Cnty., Panther Cr., tributary to Little Choctawhatchee R., 3 mi. west of Pinckard Farm Rd. and U.S. Hwy. 84, 29 May 1951, RDS 2108, collected by R. D. Suttkus (incorrectly listed as Pinehard Rd. in original description).

Notropis baileyi Suttkus & Raney, 1955a: 71.

PARATYPES: **TU 2637**, 29 specimens from Alabama, Monroe Cnty., tributary to Alabama R., 17.3 mi. S of Camden, Hwy. 11, 3 June 1951, RDS 2141, collected by R. D. Suttkus and C. D. Hancock (destroyed); **TU 2965**, 4 specimens from Alabama, Wilcox Cnty., Gravel Cr., tributary to Pursley Cr., 6.3 mi. S of Camden, Hwy. 11, 3 June 1951, RDS 2140, collected by R. D. Suttkus and C. D. Hancock; **TU 3066**, 41 specimens from Alabama, Wilcox Cnty., tributary to Pursley Cr., 1.8 mi. E of Camden, Alabama Hwy. 10, 3 June 1951, RDS 2138, collected by R. D. Suttkus and C. D. Hancock; **TU 3195**, 4 specimens from Alabama, Butler Cnty., Pine Barren Cr., 2.5 mi. S of Forest Home, 2 June 1951, RDS 2136, collected by R. D. Suttkus and C. D. Hancock; **TU 3430**, 75 specimens from Alabama, Wilcox Cnty., Pursley Cr., tributary to Alabama R., 3.4 mi. SW

of Camden, Hwy. 11, 3 June 1951, RDS 2139, collected by R. D. Suttkus and C. D. Hancock; **TU 97110**, 66 specimens from Alabama, Macon Cnty., tributary to Sawachlahatchee Cr., 1.7 mi. W of Society Hill on U.S. Hwy. 80, 12 June 1949, RDS 1051, collected by R. D. Suttkus, C. F. Cole, and R. H. Gibbs (formerly CU 16020).

Notropis bellus alegnotus Snelson, 1972: 37. (= *Lythrurus bellus alegnotus*)

PARATYPES: **TU 58810**, 10 specimens from Alabama, Jefferson Cnty., Five Mile Cr., tributary to Valley Cr., U.S. Hwy. 11 bridge, 5.0 air mi. SW of junction Alabama Hwy. 150 & U.S. Hwy. 11 bridge in Bessemer, 16 May 1969, FFS 69-7, collected by F. F. Snelson and B. W. Menzel.

Notropis cahabae Mayden & Kuhajda, 1989: 3.

PARATYPES: **TU 156264**, 3 specimens from Alabama, Bibb Cnty., Cahaba R. at mouth of unnamed tributary, 1.1 km downstream from mouth of Little Ugly Cr., 7 February 1985 (incorrectly listed as TU 156263 in original description) (removed from UAIC 8578.02).

Notropis candidus Suttkus, 1980: 3.

HOLOTYPE: **TU 103415**, from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 26 June 1969, RDS 4566, collected by R. D. Suttkus, G. E. Gunning, and R. C. Cashner.

PARATYPES: **TU 57763**, 84 specimens collected with holotype; **TU 40313**, 25 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 7 April 1966, RDS 3858, collected by R. D. Suttkus and G. E. Gunning; **TU 40903**, 26 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.8, 28 June 1966, RDS 3918, collected by R. D. Suttkus, G. E. Gunning, and G. H. Clemmer; **TU 40928**, 13 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 28 June 1966, RDS 3919, collected by R. D. Suttkus, G. E. Gunning, and G. H. Clemmer; **TU 41414**, 35 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 1 July 1966, RDS 3924, R. D. Suttkus and Environmental Biology class; **TU 47903**, 109 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.8, 26 September 1967, RDS 4202, collected by R. D. Suttkus, G. E. Gunning, and A. Kuris; **TU 52832**, 37 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 29 June 1968, RDS 4375, collected by R. D. Suttkus and G. E. Gunning; **TU 52854**, 23 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.8, 29 June 1968, RDS 4376, collected by R. D. Suttkus and G. E. Gunning; **TU 76231**, 132 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Lower Bar, river mi. 133, 16 March 1972, RDS 5193, collected by R. D. Suttkus and B. A. Thompson; **TU 76253**, 203 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 16 March 1972, RDS 5194, collected by R. D. Suttkus and B. A. Thompson; **TU 80311**, 250 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Lower Bar, river mi. 133, 6 December 1972, RDS 5350, collected by R. D. Suttkus and R. C. Cashner; **TU 86774**, 212 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Lower Bar, river mi. 133, 19 March 1974, RDS 5590, collected by

R. D. Suttkus and B. A. Thompson; **TU 96458**, 139 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Lower Bar, river mi. 133, 18 December 1975, RDS 6087, collected by R. D. Suttkus and G. E. Gunning.

Notropis cardinalis Mayden, 1988: 156. (= *Luxilus cardinalis*)

PARATYPES: **TU 145026**, 3 specimens from Oklahoma, Ottawa Cnty., Five Mile Cr., T29N, R24E, Sec. 22, 9 May 1984, collected by F. B. Cross and R. L. Mayden (removed from KU 20963).

Notropis edwarddraneyi Suttkus & Clemmer, 1968: 19.

HOLOTYPE: **TU 49485**, from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 8 March 1967, RDS 4097, collected by R. D. Suttkus and G. E. Gunning.

PARATYPES: **TU 44028**, 7324 specimens collected with holotype; **TU 33381**, 1613 specimens from Alabama, Dallas Cnty., Alabama R. at Watts Bar, 3.5 mi. upstream from Cahaba, river mi. 204.5, 29 June 1964, RDS 3515, collected by R. D. Suttkus and Environmental Biology class; **TU 35243**, 236 specimens from Alabama, Dallas Cnty., Alabama R. at old ferry landing across river from Cahaba, 27-28 June 1964, RDS 3508, collected by R. D. Suttkus and Environmental Biology class; **TU 35269**, 314 specimens from Alabama, Dallas Cnty., Alabama R. at Cahaba where Cahaba R. enters Alabama R., 28 June 1964, RDS 3513, collected by R. D. Suttkus, G. H. Clemmer, J. D. Archer, and J. V. Conner; **TU 35323**, 28 specimens from Alabama, Clarke Cnty., Alabama R. along left bank across river from Choctaw Bluff, 2 July 1964, RDS 3519, collected by R. D. Suttkus and Environmental Biology class; **TU 40293**, 297 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.8, 7 April 1966, RDS 3857, collected by R. D. Suttkus and G. E. Gunning; **TU 40303**, 1020 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 7 April 1966, RDS 3858, collected by R. D. Suttkus and G. E. Gunning; **TU 40320**, 491 specimens from Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.4, 7 April 1966, RDS 3859, collected by R. D. Suttkus and G. E. Gunning; **TU 40335**, 243 specimens from Alabama, Wilcox Cnty., Alabama R. at Wilcox Bar, river mi. 120.3, 7 April 1966, RDS 3860, collected by R. D. Suttkus and G. E. Gunning; **TU 40900**, 289 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.8, 28 June 1966, RDS 3918, collected by R. D. Suttkus, G. E. Gunning, and G. H. Clemmer; **TU 40925**, 85 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 28 June 1966, RDS 3919, collected by R. D. Suttkus, G. E. Gunning, and G. H. Clemmer; **TU 40940**, 226 specimens from Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.4, 28 June 1966, RDS 3920, collected by R. D. Suttkus, G. E. Gunning, and G. H. Clemmer; **TU 40950**, 109 specimens from Alabama, Wilcox Cnty., Alabama R. at Wilcox Bar, river mi. 120.3, 29 June 1966, RDS 3921, collected by R. D. Suttkus, G. E. Gunning, and G. H. Clemmer; **TU 41400**, 390 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 4.6 mi. E of Yellow Bluff Post Office, 1 July 1966, RDS 3924, collected by R. D. Suttkus and Environmental Biology class; **TU 41608**, 284 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.8, 4 October 1966, RDS 4011, collected by R. D. Suttkus and G. E. Gunning; **TU 41618**, 33 specimens from Alabama, Wilcox Cnty., Alabama

R. at Yellow Jacket Bar, river mi. 129.7, 4 October 1966, RDS 4012, collected by R. D. Suttkus and G. E. Gunning; **TU 41632**, 92 specimens from Alabama, Wilcox Cnty., Alabama R. at Reeves Bar, river mi. 128.5, 4 October 1966, RDS 4013, collected by R. D. Suttkus and G. E. Gunning; **TU 41639**, 187 specimens from Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.5, 4 October 1966, RDS 4014, collected by R. D. Suttkus and G. E. Gunning; **TU 41655**, 119 specimens from Alabama, Wilcox Cnty., Alabama R. at Wilcox Bar, river mi. 120.5, 5 October 1966, RDS 4015, collected by R. D. Suttkus and G. E. Gunning; **TU 41666**, 147 specimens from Alabama, Wilcox Cnty., Alabama R. at Ohio Bar, river mi. 111.6, 5 October 1966, RDS 4016, collected by R. D. Suttkus and G. E. Gunning; **TU 41670**, 301 specimens from Alabama, Monroe Cnty., Alabama R. at Stein Island, river mi. 107.5, 5 October 1966, RDS 4017, collected by R. D. Suttkus and G. E. Gunning; **TU 41695**, 83 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.8, 5 August 1966, RDS 3945, collected by R. D. Suttkus and G. E. Gunning; **TU 41711**, 29 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Lower Bar, river mi. 133, 5 August 1966, RDS 3946, collected by R. D. Suttkus and G. E. Gunning; **TU 41726**, 16 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.7, 5 August 1967, RDS 3948, collected by R. D. Suttkus and G. E. Gunning; **TU 41732**, 19 specimens from Alabama, Wilcox Cnty., Alabama R. at Reeves Bar, river mi. 128.5, 5 August 1966, RDS 3949, collected by R. D. Suttkus and G. E. Gunning; **TU 41745**, 63 specimens from Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.5, 5 August 1966, RDS 3950, collected by R. D. Suttkus and G. E. Gunning; **TU 41755**, 12 specimens from Alabama, Wilcox Cnty., Alabama R. at Wilcox Bar, river mi. 120.5, 5 August 1966, RDS 3951, collected by R. D. Suttkus and G. E. Gunning; **TU 41761**, 9 specimens from Alabama, Wilcox Cnty., Alabama R. at Ohio Bar, river mi. 111.6, 5 August 1966, RDS 3952, collected by R. D. Suttkus and G. E. Gunning; **TU 41772**, 151 specimens from Alabama, Monroe Cnty., Alabama R. at Stein Island, river mi. 107.5, 5 August 1966, RDS 3953, collected by R. D. Suttkus and G. E. Gunning; **TU 41791**, 22 specimens from Alabama, Monroe Cnty., Alabama R. at St. James Bar, river mi. 104, 5 August 1966, RDS 3954, collected by R. D. Suttkus and G. E. Gunning; **TU 41797**, 4 specimens from Alabama, Monroe Cnty., Alabama R. at Bates Bar, river mi. 99, 5 August 1966, RDS 3955, collected by R. D. Suttkus and G. E. Gunning; **TU 41813**, 10 specimens from Alabama, Monroe Cnty., Alabama R. at Silver Cr. Bar, river mi. 87.6, 6 August 1966, RDS 3957, collected by R. D. Suttkus and G. E. Gunning; **TU 41823**, 1 specimen from Alabama, Monroe Cnty., Alabama R. at mouth of Limestone Cr., river mi. 80.1, 6 August 1966, RDS 3958, collected by R. D. Suttkus and G. E. Gunning; **TU 42731**, 370 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.8, 19 December 1966, RDS 4065, collected by R. D. Suttkus and G. E. Gunning; **TU 42737**, 5630 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.5, 19 December 1966, RDS 4066, collected by R. D. Suttkus and G. E. Gunning; **TU 42746**, 687 specimens from Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.5, 19 December 1966, RDS 4067, collected by R. D. Suttkus and G. E. Gunning; **TU 42759**, 900 specimens from Alabama, Wilcox Cnty., Alabama R. at Wilcox Bar, river mi. 120.5, 19-20 December 1966, RDS 4068, collected by R. D. Suttkus and G. E. Gunning; **TU 44011**, 175 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.8, 8 March 1967, RDS 4096, collected by R. D. Suttkus and G. E. Gunning; **TU 44029**, 94 specimens from

Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.5, 9 March 1967, RDS 4098, collected by R. D. Suttkus and G. E. Gunning; **TU 44045**, 561 specimens from Alabama, Wilcox Cnty., Alabama R. at Wilcox Bar, river mi. 120.5, 9 March 1967, RDS 4099, collected by R. D. Suttkus and G. E. Gunning; **TU 46783**, 202 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.8, 31 May 1967, RDS 4143, collected by R. D. Suttkus and G. E. Gunning; **TU 46796**, 395 specimens from Alabama, Wilcox Cnty., Alabama R. at bar above Yellow Jacket Bar, 31 May 1967, RDS 4144, collected by R. D. Suttkus and G. E. Gunning; **TU 46802**, 223 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 31 May 1967, RDS 4145, collected by R. D. Suttkus and G. E. Gunning; **TU 46819**, 43 specimens from Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.5, 31 May 1967, RDS 4146, collected by R. D. Suttkus and G. E. Gunning; **TU 46830**, 32 specimens from Alabama, Wilcox Cnty., Alabama R. at Wilcox Bar, river mi. 120.5, 31 May-1 June 1967, RDS 4147, collected by R. D. Suttkus and G. E. Gunning; **TU 47346**, 64 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.7, 7 August 1967, RDS 4177, collected by R. D. Suttkus and G. E. Gunning; **TU 47361**, 49 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 7 August 1967, RDS 4178, collected by R. D. Suttkus and G. E. Gunning; **TU 47374**, 86 specimens from Alabama, Wilcox Cnty., Alabama R. at Reeves Bar, river mi. 128.5, 7 August 1967, RDS 4179, collected by R. D. Suttkus and G. E. Gunning; **TU 47387**, 168 specimens from Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.5, 7-8 August 1967, RDS 4180, collected by R. D. Suttkus and G. E. Gunning; **TU 47396**, 33 specimens from Alabama, Wilcox Cnty., Alabama R. at Wilcox Bar, river mi. 120.6, 8 August 1967, RDS 4181, collected by R. D. Suttkus and G. E. Gunning; **TU 47408**, 475 specimens from Alabama, Wilcox Cnty., Alabama R. at Ohio Bar, river mi. 111.7, 8 August 1967, RDS 4182, collected by R. D. Suttkus, G. H. Clemmer, and G. E. Gunning; **TU 47420**, 173 specimens from Alabama, Monroe Cnty., Alabama R. at Stein Island, river mi. 107.5, 8 August 1967, RDS 4183, collected by R. D. Suttkus and G. E. Gunning; **TU 47435**, 229 specimens from Alabama, Monroe Cnty., Alabama R. at Bates Bar, river mi. 99.4, RDS 4184, collected by R. D. Suttkus and G. E. Gunning; **TU 47452**, 134 specimens from Alabama, Monroe Cnty., Alabama R. at Haines Island, river mi. 96, 8 August 1967, RDS 4185, collected by R. D. Suttkus and G. E. Gunning; **TU 47477**, 89 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Lower Bar, river mi. 133, 9 August 1967, RDS 4186, collected by R. D. Suttkus and G. E. Gunning; **TU 47491**, 24 specimens from Alabama, Monroe Cnty., Alabama R. at St. James Bar, river mi. 104, 10 August 1967, RDS 4187, collected by R. D. Suttkus and G. E. Gunning; **TU 47499**, 16 specimens from Alabama, Monroe Cnty., Alabama R. at Silver Cr. Bar, river mi. 87.7, 17 August 1967, RDS 4188, collected by R. D. Suttkus and G. H. Clemmer; **TU 47515**, 306 specimens from Alabama, Wilcox Cnty., Alabama R. at Hobbs Bar, river mi. 149.5, 18 August 1967, RDS 4189, collected by R. D. Suttkus and G. H. Clemmer; **TU 47762**, 143 specimens from Alabama, Wilcox Cnty., Alabama R. at Lower Canton Bar, river mi. 156.7, along left bank, 18 August 1967, RDS 4190, collected by R. D. Suttkus and G. H. Clemmer; **TU 47781**, 9 specimens from Alabama, Wilcox Cnty., Alabama R. at Lower Canton Bar, river mi. 156.7, along right bank, 18 August 1967, RDS 4191, collected by R. D. Suttkus and G. H. Clemmer; **TU 47822**, 85 specimens from Alabama, Wilcox Cnty., Alabama R. at Hurricane Island, river mi. 166.5, 19 August 1967, RDS 4193, collected by R. D. Suttkus

and G. H. Clemmer; **TU 47838**, 75 specimens from Alabama, Wilcox Cnty., Alabama R. at St. John Bar, river mi. 164.8, 19 August 1967, RDS 4192, collected by R. D. Suttkus and G. H. Clemmer; **TU 47909**, 152 specimens from Alabama R. at Evans Upper Bar, river mi. 135.7, 26 September 1967, RDS 4204, collected by G. E. Gunning and A. Kuris; **TU 47924**, 105 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.8, 26 September 1967, RDS 4203, collected by R. D. Suttkus and G. H. Clemmer; **TU 47936**, 39 specimens from Alabama, Wilcox Cnty., Alabama R. at Reeves Bar, river mi. 128.5, 26 September 1967, RDS 4204, collected by R. D. Suttkus and G. H. Clemmer; **TU 47968**, 230 specimens from Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.5, 27 September 1967, RDS 4207, collected by R. D. Suttkus and A. Kuris; **TU 47980**, 108 specimens from Alabama, Wilcox Cnty., Alabama R. at Wilcox Bar, river mi. 120.6, 27 September 1967, RDS 4208, collected by R. D. Suttkus and A. Kuris; **TU 47994**, 65 specimens from Alabama, Wilcox Cnty., Alabama R. at Ohio Bar, river mi. 111.7, 27 September 1967, RDS 4209, collected by R. D. Suttkus and A. Kuris; **TU 48012**, 232 specimens from Alabama, Monroe Cnty., Alabama R. at Stein Island, river mi. 107.5, 27 September 1967, RDS 4210, collected by R. D. Suttkus and G. H. Clemmer.

Notropis euryzonus Suttkus, 1955: 85.

PARATYPES: **TU 10700**, 8 specimens from Alabama, Russell Cnty., tributary to Little Uchee Cr., 1.1 mi. E of Crawford, U.S. Hwy. 80, 17 September 1955, RDS 2520, collected by R. D. Suttkus; **TU 10718**, 60 specimens from Alabama, Russell Cnty., tributary to Uchee Cr., 3.2 mi. W of Crawford, U.S. Hwy. 80, 17 September 1955, RDS 2521, collected by R. D. Suttkus.

Notropis gibbsi Howell & Williams, 1971: 55. (= *Cyprinella gibbsi*)

PARATYPES: **TU 61102**, 28 specimens from Alabama, Randolph Cnty., Wedowee Cr. on Alabama Hwy. 48, 0.5 mi. E of Wedowee, T20S, R11E, Sec. 2, 14 August 1964, collected by J. D. Williams and J. C. Hall.

Notropis hubbsi Bailey & Robison, 1978: 3.

PARATYPES: **TU 13956**, 7 specimens from Texas, Harrison Cnty., Caddo Lake, 1955; **TU 96238**, 31 specimens from Arkansas, Calhoun Cnty., Locust Bayou at Arkansas Hwy. 4 bridge, 0.5 mi. W of Locust Bayou, 20 May 1975, HWR 75-47, collected by H. W. Robison and S. Pelt.

Notropis hypsilepis Suttkus & Raney, 1955b: 161.

PARATYPES: **TU 8883**, 4 specimens from Georgia, Fulton Cnty., Vickery Cr. at junction with Chattahoochee R. at Roswell, U.S. Hwy. 19, 30 March 1950, ECR 1765 and RDS 1765, collected by E. C. Raney, R. D. Suttkus, C. R. Robins and R. Backus (removed from CU 17138); **TU 97111**, 8 specimens from Georgia, Habersham Cnty., Grant Cr., tributary to Soque R. near its junction with Chattahoochee R. near Cornelia, June 1949, collected by J. W. Colston (removed from CU 18102).

Notropis imelda Cortes, 1966: 187.

PARATYPES: **TU 55375**, 5 specimens from México, Oaxaca, Río Atoyac at Juchatengo, 16°20'N, 97°05'W, 16 April 1965, collected by I. Martínez and L. Gonzáles (removed from series collected with holotype).

Notropis mekistocholas Snelson, 1971: 451.

PARATYPES: **TU 63272**, 7 specimens from North Carolina, Chatham Cnty., Rocky R. at North Carolina Hwy. 902 bridge, 7.0 air mi. SW of center of Pittsboro, 2 June 1968, FFS 68-31, collected by F. F. Snelson and W. M. Palmer (removed from NCSM 4928).

Notropis rafinesquei Suttkus, 1991: 1.

HOLOTYPE: **TU 157264**, from Mississippi, Carroll Cnty., Teoc Cr. at Mississippi Hwy. 35, R3E, T20N, Sec. 21, 12 May 1985, RDS 8758, collected by R. D. Suttkus and V. T. Colbert.

PARATYPES: **TU 140774**, 309 specimens collected with holotype; **TU 139610**, 750 specimens from Mississippi, Carroll Cnty., Teoc Cr. at Mississippi Hwy. 35, R3E, T20N, Sec. 21, 17 February 1985, RDS 8661, collected by R. D. Suttkus and K. G. Goodfellow; **TU 141302**, 50 specimens from Mississippi, Carroll Cnty., Aiken Cr. (at gravel road), R3E, T20N, Sec. 17, 22 June 1985, RDS 8795, collected by R. D. Suttkus; **TU 150052**, 97 specimens from Mississippi, Carroll Cnty., Teoc Cr. at Mississippi Hwy. 35, T20N, R3E, Sec. 21, 27 September 1987, RDS 9398, collected by R. D. Suttkus; **TU 155847**, 165 specimens from Mississippi, Carroll Cnty., Teoc Cr. at Mississippi Hwy. 35, 8 August 1989, RDS 9897, collected by R. D. Suttkus; **TU 158025**, 346 specimens from Mississippi, Carroll Cnty., Teoc Cr. at Mississippi Hwy. 35, 17 May 1990, RDS 10084, collected by R. D. Suttkus.

Notropis signipinnis Bailey & Suttkus, 1952: 1.

PARATYPES: **TU 1133**, 164 specimens from Mississippi, George Cnty., Maletts Spring Branch, tributary to Rocky Cr., tributary to Escatawpa R., 6.6 mi. SE of Lucedale, 4 June 1951, RDS 2147, collected by R. D. Suttkus and C. D. Hancock.

Notropis uranoscopus Suttkus, 1959: 7.

HOLOTYPE: **TU 15289**, from Alabama, Bibb Cnty., Cahaba R., 2.2 mi. N of Centerville, 17 March 1957, RDS 2594, collected by R. D. Suttkus, R. J. Miller, H. V. Miller, and J. DeAbate.

PARATYPES: **TU 18551**, 18 specimens collected with holotype; **TU 18569**, 2 specimens from Alabama, Bibb Cnty., Cahaba R., 2 mi. S of Centerville, 5 July 1954, University of Alabama Number 406, collected by H. H. Howell, B. Brothers, R. Chermock, A. F. Hemphill, and H. T. Boschung; **TU 18570**, 8 specimens from Alabama, Bibb Cnty., Cahaba R., 2 mi. S of Centerville, 5 July 1954, collected by J. Mallory; **TU 18674**, 8 specimens from Alabama, Bibb Cnty., Cahaba R., 8.5 mi. N of Centerville, Hwy. 27 crossing, 8 July 1958, RDS 2738, collected by R. D. Suttkus, M. Andersson, S. Salisbury, and J. DeAbate; **TU 19410**,

21 specimens from Alabama, Bibb Cnty., Cahaba R., 8.5 mi. N of Centerville, Hwy. 27 crossing, 8 September 1958, RDS 2760, collected by R. D. Suttkus and M. Andersson.

Phoxinus cumberlandensis Starnes & Starnes, 1978: 509.

HOLOTYPE: **TU 103312**, from Kentucky, Bell Cnty., Brownies Cr. along Kentucky Hwy. 987 at Cubage, 14 May 1975, collected by G. W. Wolfe and J. Lowe.

PARATYPES: **TU 103313**, 11 specimens from Kentucky, Bell Cnty., Brownies Cr. along Kentucky Hwy. 987, 8.5 km E of Cubage, 3 April 1976, collected by W. C. Starnes and L. B. Starnes; **TU 103314**, 6 specimens from Kentucky, Whitley Cnty., Archers Cr. at Cumberland Falls road, 5.4 km W of Kentucky Hwy. 204, 6 September 1976, collected by W. C. Starnes and L. B. Starnes; **TU 103315**, 1 specimen from Kentucky, Knox Cnty., Little Poplar Cr. at Cnty. Rd. 1809, 13.7 air km S of Barbourville, 24 September 1976, collected by T. Partin; **TU 103316**, 2 specimens (cleared and stained) from Kentucky, Bell Cnty., Brownies Cr. along Kentucky Hwy. 987, 8.5 km E of Cubage, 3 April 1976, collected by W. C. Starnes and L. B. Starnes; **TU 103317**, 3 specimens (cleared and stained) from Kentucky, Whitley Cnty., Youngs Cr. at gravel road, 0.8 km W of U.S. Hwy. 25W, 10.7 air km NW of Williamsburg, 6 September 1976, collected by W. C. Starnes and L. B. Starnes.

Phoxinus tennesseensis Starnes & Jenkins, 1988: 518.

HOLOTYPE: **TU 97993**, from Tennessee, Blount Cnty., spring seep tributary to Reed Cr., unnumbered cnty. rd., 5 mi. E of Tennessee Hwy. 73 (Walland), 6 June 1976, collected by W. C. Starnes, L. B. Starnes, and J. A. Loudon.

PARATYPES: **TU 97994**, 6 specimens collected with holotype; **TU (OC) 575**, 4 specimens from Tennessee, Roane Cnty., tributary to Bear Cr. at Tennessee Hwy. 95, 10 road km N of Clinch R. crossing, 15 February 1975, collected by W. C. Starnes and L. B. Starnes (cleared and stained).

Rhinichthys osculus moapae Williams, 1978: 513.

HOLOTYPE: **TU 103139**, from Nevada, Clark Cnty., Moapa R. at Anderson dairy farm, 1 May 1965, Nev. SoF 712, collected by J. E. Deacon.

PARATYPES: **TU 103140**, 3 specimens collected with holotype; **TU 103141**, 5 specimens from Nevada, Clark Cnty., Moapa R. at Lowhead Dam, 25 February 1967, collected by Vertebrate Zoology class.

Semotilus lumbee Snelson & Suttkus, 1978: 2.

HOLOTYPE: **TU 101095**, from North Carolina, Moore Cnty., fork of Aberdeen Cr. at culvert on U.S. Hwy. 1, 0.5 air mi. SW of center of Aberdeen, 8 May 1975, WMP 75-2, collected by W. M. Palmer, A. L. Braswell, and J. E. Cooper.

PARATYPES: **TU 101096**, 10 specimens collected with holotype; **TU 97877**, 13 specimens from North Carolina, Moore Cnty., fork of Aberdeen Cr. at culvert on U.S. Hwy. 1, 0.5 air mi. SW of center of Aberdeen, 12 May 1976, RDS 6148, collected by R. D. Suttkus and party.

Ictaluridae

Ictalurus serracanthus Yerger & Relyea, 1968: 373. (= *Ameiurus serracanthus*)

PARATYPES: **TU 22592**, 4 specimens from Florida, Gadsden Cnty., Lake Talquin just W of mouth of Little R., 20 October 1959, JMB 78, collected by J. M. Barkuloo and party; **TU 22642**, 1 specimen from Florida, Leon Cnty., Ochlockonee R. at Jackson Bluff, Florida Hwy. 20, 14-15 November 1959, RDS 2861, collected by R. D. Suttkus, J. M. Barkuloo, and E. Grover; **TU 37226**, 3 specimens from Florida, Wakulla Cnty., Sopchoppy R., 2.4 mi. S of Sopchoppy, U.S. Hwy. 319, 27 May 1964, collected by K. Relyea.

Noturus albater Taylor, 1969: 144.

PARATYPES: **TU 10180**, 1 specimen from Arkansas, Newton Cnty., Big Buffalo R., 15.8 mi. W of Jasper, Arkansas Hwy. 21, 30 April 1955, RDS 2485, collected by R. D. Suttkus, A. Harper, W. Hildebrand, and H. D. Hoese; **TU 12240**, 15 specimens from Arkansas, Washington Cnty., West Fork White R., 6.1 mi. S of Fayetteville, U.S. Hwy. 71, 2 September 1955, RDS 2509, collected by R. D. Suttkus; **TU 12258**, 85 specimens from Arkansas, Washington Cnty., White R., 8.3 mi. E of Springdale, Arkansas Hwy. 68, 3 September 1955, RDS 2512, collected by R. D. Suttkus; **TU 16553**, 35 specimens from Arkansas, Washington Cnty., White R., 8.3 mi. E of Springdale, Arkansas Hwy. 68, 4 October 1957, collected by R. D. Suttkus, C. F. Cole, J. DeAbate, S. Harvey, M. Andersson, and B. I. Sundararaj; **TU 16575**, 12 specimens from Arkansas, Washington Cnty., White R., 8.3 mi. E of Springdale, Arkansas Hwy. 68, 5 October 1957, RDS 2667, collected by R. D. Suttkus, C. F. Cole, J. DeAbate, S. Harvey, M. Andersson, and B. I. Sundararaj; **TU 22401**, 7 specimens from Arkansas, Madison Cnty., War Eagle Cr., 5.4 mi. N of Huntsville, Arkansas Hwy. 23, 25 October 1959, RDS 2856, collected by R. D. Suttkus, M. Andersson, and B. I. Sundararaj; **TU 22504**, 37 specimens from Arkansas, Newton Cnty., Buffalo Fork of White R., 15.5 mi. W of Jasper, Arkansas Hwy. 74, 24 October 1959, RDS 2853, collected by R. D. Suttkus, M. Andersson, and B. I. Sundararaj; **TU 22514**, 2 specimens from Arkansas, Newton Cnty., Buffalo Fork of White R., 15.5 mi. W of Jasper, Arkansas Hwy. 74, 25 October 1959, RDS 2854, collected by R. D. Suttkus, M. Andersson, and B. I. Sundararaj; **TU 22709**, 9 specimens from Arkansas, Cleburne Cnty., Devils Fork Little Red R. between Stark and Edgemont, 23 October 1959, RDS 2852, collected by R. D. Suttkus, M. Andersson, and B. I. Sundararaj.

Noturus elegans Taylor, 1969: 150.

PARATYPES: **TU 19390**, 12 specimens from Kentucky, Green Cnty., Green R., 3.8 mi. ENE of Donnansburg, Kentucky Hwy. 88, 7 September 1958, RDS 2756, collected by R. D. Suttkus and M. Andersson; **TU 19460**, 16 specimens from Kentucky, Barren Cnty., tributary to Barren R., 2.6 mi. SW of Lucas, U.S. Hwy. 31E, at old mill dam, 7 September 1958, RDS 2757, collected by R. D. Suttkus and M. Andersson.

Noturus lachneri Taylor, 1969: 54.

PARATYPES: **TU 7074**, 1 specimen from Arkansas, Garland Cnty., 7.7 mi. SSW of Owensville, 3 mi. SE of U.S. Hwy. 70, 7 August 1953, EL 94, collected

by E. Liner; **TU 7077**, 2 specimens from Arkansas, Garland Cnty., 7.7 mi. SSW of Owensville, 3 mi. SE of U.S. Hwy. 70, 7 August 1953, EL 94, collected by E. Liner.

Noturus munitus Suttkus & Taylor, 1965: 171.

HOLOTYPE: **TU 26250**, from Mississippi, Marion Cnty., Pearl R., 2.6 mi. E of Sandy Hook, 14 November 1955, collected by R. D. Suttkus and K. T. Nielsen.

PARATYPES: **TU 11311**, 195 specimens collected with holotype; **TU 1844**, 23 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 24-25 November 1951, RDS 2207, collected by R. D. Suttkus and P. K. Anderson; **TU 3557**, 8 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 16 February 1952, RDS 2238, collected by R. D. Suttkus, P. K. Anderson, H. K. Suzuki, and T. Cain; **TU 3627**, 73 specimens from Mississippi, Marion Cnty., Pearl R., 4 mi. NE of Sandy Hook, 13 January 1952, RDS 2217, collected by R. D. Suttkus, P. K. Anderson, and W. D. Stone; **TU 3951**, 11 specimens from Mississippi, Marion Cnty., tributary to Pearl R., 4.8 mi. SE of Columbia, Mississippi Hwy. 13, 23 May 1952, RDS 2297, collected by R. D. Suttkus, T. Cain, and F. Sogandares-Bernal; **TU 4872**, 1 specimen from Mississippi, Marion Cnty., tributary to Pearl R., 4.3 mi. S of Foxworth, 19 August 1952, RDS 2173, collected by R. D. Suttkus, C. D. Hancock, and J. Black; **TU 7369**, 1 specimen from Louisiana, Washington Parish, Pushepatapa Cr., 0.8 mi. S of Varnado, 19 January 1952, RDS 2222, collected by R. D. Suttkus and H. K. Suzuki; **TU 8886**, 4 specimens from Mississippi, Marion Cnty., tributary to Pearl R., 0.5 mi. S of Hub or 8.5 mi. S of Columbia, 28 October 1950, RDS 2013, collected by R. D. Suttkus and C. L. Smith; **TU 9709**, 3 specimens from Mississippi, Marion Cnty., tributary to Pearl R., 5 mi. S of Columbia, 30 June 1954, RDS 2456, collected by R. D. Suttkus; **TU 10462**, 3 specimens from Louisiana, Washington Parish, Pushepatapa Cr., 0.8 mi. S of Varnado, 29 June 1954, RDS 2455, collected by R. D. Suttkus and K. T. Nielsen; **TU 11588**, 1 specimen from Louisiana, Washington Parish, Pushepatapa Cr., 8.2 mi. N of Bogalusa, 7 May 1956, RDS 2556, collected by R. D. Suttkus and Field Zoology class; **TU 13954**, 214 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 5 October 1956, RDS 2565, collected by R. D. Suttkus, R. J. Miller, and R. K. Chipman; **TU 14930**, 67 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 12-13 January 1957, RDS 2576, collected by R. D. Suttkus and R. J. Miller; **TU 14938**, 82 specimens from Mississippi, Marion Cnty., Pearl R., 2.6 mi. E. of Sandy Hook, 6 January 1957, RDS 2574, collected by R. D. Suttkus and R. J. Miller; **TU 15073**, 2 specimens from Louisiana, Washington Parish, Pushepatapa Cr., 1 mi. S of Varnado or 7 mi. N of Bogalusa, 13 January 1957, RDS 2578, collected by R. D. Suttkus and R. J. Miller; **TU 15171**, 92 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 22-23 January 1957, RDS 2580, collected by R. D. Suttkus and N. C. Negus; **TU 15465**, 2 specimens from Louisiana, Washington Parish, Pushepatapa Cr., 7 mi. N of Bogalusa, Hwy. 21, 21 April 1957, RDS 2600, collected by R. D. Suttkus, R. H. Gibbs, and party; **TU 16148**, 6 specimens from Mississippi, Marion Cnty., Ten Mile Cr., tributary to Pearl R., 9.7 mi. N of Sandy Hook, 7 August 1957, RDS 2641, collected by R. D. Suttkus and R. J. Miller; **TU 17472**, 1 specimen from Louisiana, Washington Parish, Pushepatapa Cr., 0.8 mi. S of Varnado, Louisiana Hwy. 21, 20 March 1958, RDS 2692,

collected by R. D. Suttkus, M. Andersson, and S. Harvey; **TU 17721**, 4 specimens from Mississippi, Simpson Cnty., Strong R., 2 mi. W of Pinola, 3 April 1958, RDS 2697, collected by R. D. Suttkus, J. S. Suttkus, and M. Andersson; **TU 17951**, 1 specimen from Mississippi, Marion Cnty., Ten Mile Cr., 10.4 mi. S of Columbia, Mississippi Hwy. 35, 3 May 1958, RDS 2711, collected by R. D. Suttkus, M. Andersson, and S. Simpson; **TU 18739**, 2 specimens from Mississippi, Simpson Cnty., Strong R., 2 mi. W of Pinola, Mississippi Hwy. 28 (formerly Hwy. 20), 3 July 1958, RDS 2735, collected by R. D. Suttkus, M. Andersson, and J. S. Suttkus; **TU 18963**, 60 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 3 November 1957, RJM 1053, collected by R. J. Miller, H. V. Miller, M. Andersson, and D. Boyer; **TU 19781**, 9 specimens from Mississippi, Simpson Cnty., Strong R., 2 mi. W of Pinola, Mississippi Hwy. 20, 8 May 1959, RDS 2774, collected by R. D. Suttkus and J. S. Suttkus; **TU 19825**, 52 specimens from Louisiana, Washington Parish, Bogue Chitto R., 1 mi. W of Warnerton, 2 May 1959, RDS 2770, collected by R. D. Suttkus, D. Landwehr, and L. Redman; **TU 19880**, 3 specimens from Louisiana, Washington Parish, Bogue Chitto R., 1 mi. W of Warnerton, 3 May 1959, RDS 2773, collected by R. D. Suttkus and Vertebrate Natural History class; **TU 22824**, 38 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 26 October 1959, RDS 2857, collected by R. D. Suttkus, M. Andersson, and B. I. Sundararaj; **TU 23127**, 1 specimen from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 24 March 1960, RDS 2897, collected by R. D. Suttkus and G. E. Gunning; **TU 23310**, 1 specimen from Louisiana, Washington Parish, Bogue Chitto R., 1 mi. S of Enon, Louisiana Hwy. 437, 3 July 1960, RDS 2913, collected by R. D. Suttkus and J. S. Ramsey; **TU 23351**, 1 specimen from Louisiana, Washington Parish, Bogue Chitto R., 2 mi. W of Warnerton, Louisiana Hwy. 438, 3 July 1960, RDS 2914, collected by R. D. Suttkus and J. S. Ramsey; **TU 23518**, 24 specimens from Mississippi, Copiah Cnty., Copiah Cr., 2.4 mi. S of Georgetown, Mississippi Hwy. 27, 22 July 1960, RDS 2935, collected by R. D. Suttkus and J. S. Ramsey; **TU 23701**, 1 specimen from Mississippi, Marion Cnty., tributary to Pearl R., 0.5 mi N of Marion Cnty. line, 21 July 1960, RDS 2928, collected by R. D. Suttkus and J. S. Ramsey; **TU 23869**, 3 specimens from Mississippi, Copiah Cnty., Copiah Cr., 2.1 mi. S of Georgetown, Mississippi Hwy. 27, 25 November 1960, RDS 2940, collected by R. D. Suttkus and P. Menzies; **TU 26657**, 87 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 20 October 1961, JSR 61-95, collected by J. S. Ramsey and J. E. Thomerson; **TU 26695**, 1 specimen from Mississippi, Marion Cnty., Holiday Cr., 0.5 mi. S of Goss, Mississippi Hwy. 13, 21 October 1961, JSR 61-98, collected by J. S. Ramsey and J. E. Thomerson; **TU 26759**, 11 specimens from Mississippi, Lawrence Cnty., Fair R., 4.5 mi. N of Monticello, Mississippi Hwy. 27, 3 November 1961, JSR 61-104, collected by J. S. Ramsey and J. E. Thomerson; **TU 26878**, 1 specimen from Mississippi, Marion Cnty., Silver Cr. at N limits of Morgantown, Mississippi Hwy. 587, 9 December 1961, JSR 61-116, collected by J. S. Ramsey and J. E. Thomerson; **TU 27137**, 5 specimens from Mississippi, Lawrence Cnty., Pearl R., 2.5 mi. S Oakvale, 29 August 1962, RDS 3166, collected by R. D. Suttkus and J. S. Suttkus; **TU 27172**, 18 specimens from Mississippi, Marion Cnty., 1.5 mi. SE of Morgantown, 30 August 1962, RDS 3168, collected by R. D. Suttkus and J. S. Suttkus; **TU 27299**, 12 specimens from Mississippi, Lawrence Cnty., Bahala Cr., 6 mi. S of Rockport, Mississippi Hwy. 27, 28 October 1961, JSR 61-103, collected by J. S. Ramsey and J. E. Thomerson; **TU 28034**, 87 specimens from Mississippi,

Marion Cnty., Pearl R., 1.5 mi. SE of Foxworth, 1 December 1962, RDS 3187, collected by R. D. Suttkus and J. S. Suttkus; **TU 28272**, 47 specimens from Mississippi, Marion Cnty., Pearl R., 1.5 mi. SE of Foxworth, 17 October 1962, RDS 3172, collected by R. D. Suttkus and C. D. Barbour; **TU 28303**, 4 specimens from Mississippi, Marion Cnty., Pearl R., 3 mi. SE of Foxworth, 18 October 1962, RDS 3173, collected by R. D. Suttkus and C. D. Barbour; **TU 28316**, 13 specimens from Mississippi, Marion Cnty., Pearl R. above mouth of Ten Mile Cr., 6 mi. SE of Foxworth, 18 October 1962, RDS 3174, collected by R. D. Suttkus and C. D. Barbour; **TU 28345**, 10 specimens from Mississippi, Marion Cnty., Pearl R., 4 mi. NNE of Sandy Hook, 0.5 mi. upstream from mouth of Hurricane Cr., 18 October 1962, RDS 3175, collected by R. D. Suttkus and C. D. Barbour; **TU 28373**, 7 specimens from Mississippi, Marion Cnty., Pearl R., 2 mi. NE of Sandy Hook, 18 October 1962, RDS 3176, collected by R. D. Suttkus and C. D. Barbour; **TU 28391**, 23 specimens from Mississippi, Marion Cnty., Pearl R., 1.5 mi. NE of Sandy Hook, 19 October 1962, RDS 3177, collected by R. D. Suttkus and C. D. Barbour; **TU 28403**, 16 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. ESE of Sandy Hook, 19 October 1962, RDS 3178, collected by R. D. Suttkus and C. D. Barbour; **TU 28429**, 24 specimens from Louisiana, Washington Parish, Pearl R., 4 mi. E of Angie, 19 October 1962, RDS 3179, collected by R. D. Suttkus and C. D. Barbour; **TU 28534**, 240 specimens from Mississippi, Marion Cnty., Pearl R., 1.5 mi. SE of Foxworth, 19-20 December 1962, RDS 3188, collected by R. D. Suttkus and W. T. Mason; **TU 28719**, 30 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 21 October 1961, JSR 61-97, collected by J. S. Ramsey and J. E. Thomerson; **TU 28768**, 129 specimens from Mississippi, Marion Cnty., Pearl R., 2.3 mi. E of Sandy Hook, 28 December 1962, RDS 3191, collected by R. D. Suttkus and J. S. Ramsey; **TU 28820**, 14 specimens from Mississippi, Simpson Cnty., Strong R., 2 mi. W of Pinola, Mississippi Hwy. 28, 29 December 1962, RDS 3193, collected by R. D. Suttkus and J. S. Ramsey; **TU 29942**, 5 specimens from Louisiana, Washington Parish, Pearl R. just below sill at Pools Bluff, 4 mi. S of Bogalusa, 30-31 August 1963, collected by R. D. Suttkus and G. E. Gunning; **TU 29962**, 1 specimen from Louisiana, St. Tammany Parish, Pearl R. at river mi. 52, 0.2 mi. below mouth of McGehee Cr., 10 September 1963, RDS 3326, collected by R. D. Suttkus, J. S. Ramsey, and G. E. Gunning; **TU 29975**, 1 specimen from Louisiana, St. Tammany Parish, Pearl R. at river mi. 46, 10 September 1963, RDS 3328, collected by R. D. Suttkus, J. S. Ramsey, and G. E. Gunning; **TU 29989**, 1 specimen from Louisiana, St. Tammany Parish, West Pearl R., 5 mi. SE of Talisheek, 11 September 1963, RDS 3332, collected by R. D. Suttkus, J. S. Ramsey, and G. E. Gunning; **TU 30010**, 17 specimens from Louisiana, Washington Parish, Pearl R. just below sill at Pools Bluff, 4 mi. S of Bogalusa, 29 September 1963, RDS 3342, collected by R. D. Suttkus, J. S. Ramsey, and G. E. Gunning; **TU 30025**, 2 specimens from Louisiana, St. Tammany Parish, Pearl R., 0.2 mi. below mouth of McGehee Cr., 10 October 1963, RDS 3343, collected by R. D. Suttkus and G. E. Gunning; **TU 30040**, 2 specimens from Louisiana, Washington Parish, Pearl R. just below sill at Pools Bluff, 4 mi. S of Bogalusa, 25 October 1963, RDS 3353, collected by R. D. Suttkus and G. E. Gunning; **TU 30149**, 32 specimens from Mississippi, Simpson Cnty., Strong R. at rapids upstream of Mississippi Hwy. 28 bridge, 2 mi. W of Pinola, 6 November 1963, RDS 3357, collected by R. D. Suttkus and J. S. Ramsey.

Noturus phaeus Taylor, 1969: 100.

PARATYPES: **TU 3037**, 4 specimens from Mississippi, Lafayette Cnty., tributary to Yocona R., 5.1 mi. E of Yocona or 14.7 mi. E of Oxford, 23 May 1952, collected by R. D. Suttkus, T. Cain, and F. Sogandares-Bernal; **TU 3124**, 4 specimens from Mississippi, Lafayette Cnty., tributary to Yocona R., 8 mi. E of Oxford, Mississippi Hwy. 6, 24 May 1952 (incorrectly listed as TU 3134 in original description); **TU 3668**, 3 specimens from Mississippi, Lafayette Cnty., tributary to Yocona R., 7.0 mi. E of Oxford, "old" Mississippi Hwy. 6, 24 May 1952, collected by R. D. Suttkus, T. Cain, and F. Sogandares-Bernal (inadvertantly omitted from first type list); **TU 14014**, 1 specimen from Mississippi, Lafayette Cnty., Yocona R., 7.9 mi. SE of Oxford, Mississippi Hwy. 334, 12 July 1956, collected by G. H. Penn and J. B. Black; **TU 14024**, 1 specimen from Mississippi, Alcorn Cnty., 3 mi. N of Biggersville, U.S. Hwy. 45, 12 July 1956, collected by G. H. Penn and J. B. Black; **TU 14036**, 2 specimens from Mississippi, Benton Cnty., 0.3 mi. W of Michigan City, Mississippi Hwy. 7, 11 July 1956, collected by G. H. Penn and J. B. Black.

Noturus stanauli Etnier & Jenkins, 1980: 19.

HOLOTYPE: **TU 110929**, from Tennessee, Hancock Cnty., Clinch R. at Frost Ford, river mi. 181.1, 11.8 air km WSW of Kyles Ford, 21 April 1978, collected by D. L. Batch, B. H. Bauer, B. A. Branson, R. T. Bryant, D. A. Etnier, J. L. Harris, J. A. Louton, and M. G. Ryon.

PARATYPES: **TU 110930**, 5 specimens collected with holotype.

Noturus stigmosus Taylor, 1969: 173.

PARATYPES: **TU 19217**, 4 specimens from Michigan, Washtenaw Cnty., Huron R. at North Territorial Rd., 4 mi. NW of Dexter, 31 August 1958, RDS 2750, collected by R. D. Suttkus, C. R. Gilbert, and W. Davis; **TU 19246**, 6 specimens from Michigan, Washtenaw Cnty., Huron R. at North Territorial Rd., 4 mi. NW of Dexter, 3 September 1958, RDS 2752, collected by R. D. Suttkus, M. Andersson, and T. Poulson.

Noturus taylори Douglas, 1972: 785.

PARATYPES: **TU 69700**, 10 specimens from Arkansas, Montgomery Cnty., South Fork of the Caddo R., 1 mi. SE of Hopper and 0.5 mi. S of Arkansas Hwy. 240, 5 March 1971, collected by N. H. Douglas, D. W. Fruge, D. Heard, and J. Lindley (missing) (removed from NLU 18098).

Prietella phreatophila Carranza, 1954: 132.

PARATYPES: **TU 10810**, 4 specimens from Coahuila, México, "El Potrero" de Doña Mariana, Municipio de Múzquiz, at the base of Sierra de Santa Rosa, 29 August 1954, collected by J. Carranza and C. Bolivar (formerly in the series retained by J. Carranza at time of publication, subsequently sent to Tulane as a gift; one specimen removed, skeletonized and recataloged as TU (OC) 178).

Pimelodidae

Rhamdia luigiana Villa, 1977: 133.

PARATYPES: **TU 102026**, 3 specimens from Nicaragua, Depto. Granada, Lake Nicaragua between Ometepe and Zapatera Is., 11 m deep, 6 November 1976, JV 76-132, collected by J. Villa and crew of M/V Gaspar (removed from series collected with holotype).

Muraenidae

Gymnothorax kolpos Böhlke & Böhlke, 1980: 223.

PARATYPES: **TU 82455**, 2 specimens from Gulf of Mexico, 28°28'N, 90°00.3'W, 49 fms., 2 April 1973, JHC 73-315, collected by crew of R/V Oregon II cruise 44, W. W. Forman and J. H. Caruso.

Ophichthidae

Ophichthus rex Böhlke & Caruso, 1980: 239.

PARATYPES: **TU 82453**, 1 specimen from Gulf of Mexico, 28°28'N, 90°02'W, 45 fms., 2 April 1973, JHC 73-314, collected by crew of R/V Oregon cruise 44, W. W. Forman and J. H. Caruso; **TU 88498**, 1 specimen from Gulf of Mexico, Grand Isle Block 43, 28°59'N, 89°59'W, 96 ft., 1 March 1969, BAT 69-29, collected by B. A. Thompson; **TU 88499**, 1 specimen from Louisiana, St. Bernard Parish, Gulf of Mexico, East Bay area, East Delta Block 34, 135 ft., 3 August 1969, RJI 69-73, collected by R. J. Irwin; **TU 88500**, 1 specimen from Louisiana, Gulf of Mexico, 0.2 mi. W of Southwest Pass, 135 ft., 16 August 1969, RJI 69-79, collected by R. J. Irwin; **TU 88501**, 1 specimen from Louisiana, Gulf of Mexico, Grand Isle Block 43AA, 11 April 1970, JHC 70-14, collected by J. H. Caruso and B. A. Thompson; **TU 88502**, 1 specimen from Gulf of Mexico, 29°17.1'N, 88°58.9'W, 12 fms., 28 March 1973, JHC 73-286, collected by J. H. Caruso, W. W. Forman, and crew of R/V Oregon cruise 44; **TU 88505**, 1 specimen from Gulf of Mexico, 28°56.5'N, 88°05'W, 36 fms., 28 March 1973, JHC 73-289, collected by J. H. Caruso, W. W. Forman, and crew of R/V Oregon cruise 44; **TU 88506**, 1 specimen from Gulf of Mexico, 28°57'N, 89°39.2'W, 31 fms., 4 April 1973, JHC 73-322, collected by J. H. Caruso, W. W. Forman, and crew of R/V Oregon cruise 44; **TU 88507**, 1 specimen (skull only) from Gulf of Mexico, 29°09.2'N, 88°16.8'W, 200 fms., 8 May 1973, JHC 73-361, collected by J. H. Caruso and crew of R/V Oregon cruise 45; **TU 88508**, 1 specimen from Gulf of Mexico, 27°52.8'N, 90°53.1'W, 144-178 fms., 16 May 1973, JHC 73-286, collected by J. H. Caruso and crew of R/V Oregon cruise 45; **TU 88510**, 1 specimen from Gulf of Mexico, 28°21'N, 91°28'W, 34 fms., 7 December 1973, Oregon Sta. 14300, collected by Guthertz and crew of R/V Oregon cruise 48.

Cyprinodontidae

Cualac tessellatus Miller, 1956: 9.

PARATYPES: **TU 6557**, 32 specimens from San Luis Potosí, México, La Media Luna, about 7 mi. SSW of settlement of Río Verde, collected by R. T. Gregg (removed from UMMZ 170948).

Cyprinodon labiosus Humphries & Miller, 1981: 55.

PARATYPES: **TU 111575**, 6 specimens from México, Lake Chichancanab, north end of North Pond, Yucatán, 27 July 1974, collected by J. M. Humphries and M. M. Stevenson (removed from UMMZ 201749).

Cyprinodon maya Humphries & Miller, 1981: 55.

PARATYPES: **TU 111576**, 5 specimens from México, Lake Chichancanab, lagoon on north side of road at Esmerelda, Yucatán, 27 July 1974, collected by J. M. Humphries and M. M. Stevenson (removed from UMMZ 201761).

Cyprinodon nazas Miller, 1976: 72.

PARATYPES: **TU 30616**, 26 specimens from Durango, México, tributary to Río del Peñon de Covadonga about 2 mi. SW of Peñon Blanco, 22 June 1963, CDB 63-10, collected by C. D. Barbour and S. Contreras.

Cyprinodon pecosensis Echelle & Echelle, 1978: 573.

HOLOTYPE: **TU 97127**, from New Mexico, Chaves Cnty., oxbow on Pecos R. at Bitter Lakes Wildlife Refuge, 4 April 1972, collected by A. A. Echelle and A. F. Echelle.

PARATYPES: **TU 97128**, 80 specimens collected with holotype; **TU 97026**, 248 specimens from Texas, Reeves Cnty., Salt Cr. at Farm Rd. 652 bridge, 16 August 1971, collected by A. A. Echelle and A. F. Echelle; **TU 97030**, 12 specimens from New Mexico, Chaves Cnty., Salt Cr. Wilderness Area, single large sunken pothole, 2 June 1971, collected by A. A. Echelle and A. F. Echelle; **TU 97033**, 30 specimens from New Mexico, Chaves Cnty., Comanche Draw, just inside entrance to Bottomless Lakes State Park, 2 April 1972, collected by A. A. Echelle and A. F. Echelle; **TU 97037**, 46 specimens from Texas, Reeves Cnty., Salt Cr., U.S. Hwy. 285 bridge N of Orla, 28 March 1972, collected by A. A. Echelle and A. F. Echelle; **TU 97039**, 88 specimens from New Mexico, Chaves Cnty., Figure-eight Lake, Bottomless Lakes State Park, April 1972, collected by A. A. Echelle and A. F. Echelle; **TU 97042**, 81 specimens from New Mexico, Chaves Cnty., Bitter Lakes National Wildlife Refuge, pothole no. 2, 30 October 1970, collected by A. A. Echelle and A. F. Echelle; **TU 97043**, 51 specimens from New Mexico, Eddy Cnty., Pecos R. about 5 mi. SE of Malaga, 31 March 1972, collected by A. A. Echelle and A. F. Echelle; **TU 97048**, 86 specimens from New Mexico, Chaves Cnty., mouth of Lost Cr., Bitter Lakes National Wildlife Refuge, unit no. 4 near spring, 4 March 1971, collected by A. A. Echelle and A. F. Echelle; **TU 97049**, 23 specimens from New Mexico, Chaves Cnty., Cottonwood Spring, Bitter Lakes National Wildlife Refuge, 15 August 1971, collected by A. A. Echelle and A. F. Echelle; **TU 97051**, 37 specimens from New Mexico, Chaves Cnty., Cottonwood Spring, upper end unit no. 4, Bitter Lakes National Wildlife Refuge, 18 November 1971, collected by A. A. Echelle and A. F. Echelle; **TU 97053**, 91 specimens from New Mexico, Chaves Cnty., Bitter Lakes National Wildlife Refuge, last sinkhole with fish along road, 1 June 1971, collected by A. A. Echelle and A. F. Echelle; **TU 97056**, 130 specimens from New Mexico, Chaves Cnty., isolated pool near spring at upper end unit no. 4, Bitter Lakes National Wildlife Refuge, 1 June 1971, collected by A. A. Echelle

and A. F. Echelle (incorrectly listed as TU 97057 in description); **TU 97066**, 41 specimens from New Mexico, Chaves Cnty., spring no. 1, upper end unit no. 4, Bitter Lakes National Wildlife Refuge, 15 August 1971, collected by A. A. Echelle and A. F. Echelle; **TU 97070**, 50 specimens from Texas, Crane/Pecos Cnty. line, Pecos R., Farm Rd. 1053 N of Imperial, 26 March 1972, collected by A. A. Echelle and A. F. Echelle; **TU 97081**, 120 specimens from New Mexico, Chaves Cnty., Bitter Lakes National Wildlife Refuge at upper end of unit no. 4, 1 June 1971, collected by A. A. Echelle and A. F. Echelle; **TU 97085**, 67 specimens from Texas, Pecos Cnty., ditch below Orient Reservoir dam, ranch road 2593, 26 March 1972, collected by A. A. Echelle and A. F. Echelle; **TU 97087**, 63 specimens from New Mexico, Chaves Cnty., Bottomless Lakes State Park, 28 October 1970, collected by A. A. Echelle and A. F. Echelle; **TU 97092**, 83 specimens from New Mexico, Chaves Cnty., Lazy Lagoon, Bottomless Lakes State Park, April 1972, collected by A. A. Echelle and A. F. Echelle.

Cyprinodon simus Humphries & Miller, 1981: 60.

PARATYPE: **TU 111577**, 1 specimen from México, Lake Chichancanab, lagoon on north side of road at Esmerelda, Yucatán, 27 July 1974, collected by J. M. Humphries and M. M. Stevenson (removed from UMMZ 201762).

Fundulus bifax Cashner & Rogers *in* Cashner, et al., 1988: 675.

PARATYPES: **TU 15280**, 3 specimens from Alabama, Elmore Cnty., Gold Branch, tributary to Channahatchee Cr., 6 mi. N of Eclectic, Alabama Hwy. 63, 16 March 1957, RDS 2592, collected by R. D. Suttkus, R. J. Miller, H. V. Miller, and J. DeAbate; **TU 41114**, 9 specimens from Alabama, Elmore Cnty., Gold Branch, tributary to Channahatchee R., 6 mi. N of Eclectic, Alabama Hwy. 63, 12 April 1966, RDS 3873, collected by R. D. Suttkus and G. H. Clemmer.

Fundulus euryzonus Suttkus & Cashner, 1981: 2.

HOLOTYPE: **TU 116631**, from Louisiana, Tangipahoa Parish, East Fork Big Cr., tributary to Tangipahoa R., at Louisiana Hwy. 1054, 4 March 1980, RDS 7283, collected by R. D. Suttkus, R. Reynolds, and J. Reynolds.

PARATYPES: **TU 116632**, 44 specimens collected with holotype; **TU 83182**, 40 specimens from Louisiana, Tangipahoa Parish, East Fork of Big Cr. 4.7 mi. E of Arcola, Louisiana Hwy. 1054, 10 March 1972, RDS 5180, collected by R. D. Suttkus and party; **TU 106576**, 22 specimens from Louisiana, Tangipahoa Parish, East Fork Big Cr., tributary to Tangipahoa R., at Louisiana Hwy. 1054, 27 March 1978, RDS 6672, collected by R. D. Suttkus, E. C. Beckham, W. M. Howell, and A. Black; **TU 106601**, 58 specimens from Louisiana, Tangipahoa Parish, East Fork Big Cr., tributary to Tangipahoa R., at Louisiana Hwy. 1054, 6.8 roadmi. E of Arcola, 27 March 1978, RDS 6673, collected by R. D. Suttkus, E. C. Beckham, W. M. Howell, and A. Black; **TU 116357**, 21 specimens from Louisiana, Tangipahoa Parish, East Fork of Big Cr. 4.7 mi. E of Arcola, Louisiana Hwy. 1054, 4 October 1974, RDS 5763, collected by R. D. Suttkus and R. Odom; **TU 116504**, 22 specimens from Louisiana, Tangipahoa Parish, East Fork of Big Cr. 4.9 mi. ENE of Arcola at Louisiana Hwy. 1054 bridge, 24 February 1980, RDS 7273, collected by R. D. Suttkus and R. C. Cashner; **TU 116597**, 42 specimens from Louisiana, Tangipahoa Parish, East Fork of Big Cr. 4.9 mi. ENE of

Arcola at Louisiana Hwy. 1054 bridge, 4 March 1980, RDS 7281, collected by R. D. Suttkus, R. Reynolds, and J. Reynolds.

Fundulus julisia Williams & Etnier, 1982:11.

PARATYPES: **TU 33495**, 1 specimen from Tennessee, Coffee Cnty., tributary to tributary to Hickory Cr., tributary to Collins R., 13.1 mi. SW of McMinnville, Tennessee Hwy. 55, 17 July 1964, JSR 64-69, collected by J. S. Ramsey and D. W. Walton; **TU 33511**, 3 specimens from Tennessee, Coffee Cnty., Little Duck R. at east limit of Manchester, Tennessee Hwy. 55, 17 July 1964, JSR 64-70, collected by J. S. Ramsey and D. W. Walton.

Xiphophorus marmorata Obregon & Contreras, 1988: 95.

PARATYPES: **TU 157267**, 2 specimens from Coahuila, México, El Socavón, 5.2 km SW of Múzquiz, Coahuila, 2 June 1978, SCB 78-18, collected by S. Contreras (removed from UANL 7275).

Caproidae

Antigonia combatia Berry & Rathjen, 1958: 255.

PARATYPES: **TU 18373**, 2 specimens from Atlantic Ocean, 07°31'N, 54°16'W, off Surinam, 125 fms., 8 November 1958, Oregon Sta. No. 2013, collected by crew of M/V Oregon.

Atherinidae

Atherinella ammophila Chernoff & Miller, 1984: 4.

PARATYPES: **TU 134878**, 3 specimens from Veracruz, México, Río de La Palma at La Palma, 1 January 1978, collected by W. W. Forman and M. Konikoff.

Chiostoma aculeatum Barbour, 1973: 130.

HOLOTYPE: **TU 40889**, from Guanajuato, México, south shore of Laguna de Yuriria about 1.5 mi. E of Yuriria, 1 August 1963, CDB 63-71, collected by C. D. Barbour and S. Contreras.

PARATYPES: **TU 40864**, 11 specimens collected with holotype.

Chiostoma riojai Solórzano & López, 1965b: 145.

PARATYPES: **TU 40173**, 2 specimens from México, México, Laguna de Santiago Tilapa, 31 October 1963, LB 1820, collected by A. Solórzano, R. Cruz, R. Aguilar, and F. Carmona.

Poblana ferdebueni Solórzano & López, 1965a: 209.

PARATYPES: **TU 38631**, 3 specimens from México, Puebla, Laguna de Almoloya o Chignahuapan, 22 May 1959, LB 951, collected by A. Solórzano and J. Obregón.

Serranidae

Pikea mexicanus Schultz, 1958: 323. (= *Bathyanthias mexicanus*)

PARATYPES: **TU 11004**, 6 specimens from Gulf of Mexico, 27°10'N, 96°20'W, 150 fms., 5 June 1954, Oregon Sta. 1094, collected by crew of M/V Oregon (gift to USNM); **TU 11008**, 1 specimen from Gulf of Mexico, 27° 10'N, 96°20'W, 150 fms., 5 June 1954, Oregon Sta. 1094, collected by crew of M/V Oregon; **TU 12972**, 11 specimens from Gulf of Mexico, 28°47'N, 85°19'W, 64 fms., 40 ft. flat trawl, 7 March 1953, Oregon Sta. 895, collected by crew of M/V Oregon; **TU 12985**, 1 specimen from Gulf of Mexico, 29°19'N, 86°04'W, 82 fms., 40 ft. trawl, 31 October 1953, Oregon Sta. 864, collected by crew of M/V Oregon; **TU 14739**, 1 specimen from Gulf of Mexico, 27°40'N, 95°45'W, 100 fms., 80 ft. balloon trawl, 7 May 1956, Oregon Sta. 1510, collected by crew of M/V Oregon.

Centrarchidae

Ambloplites ariommus Viosca, 1936: 37.

PARATYPES: **TU 2856**, 14 specimens from Louisiana, St. Tammany Parish, Little Bogue Falaya "Falia" Cr., 3 mi. N of Covington, 19 May 1935, collected by P. Viosca and G. H. Penn (formerly in the private collection of the late Percy Viosca; given to Tulane in 1955; specimens discolored green by copper eyelet of original label).

Ambloplites constellatus Cashner & Suttkus, 1977: 148.

HOLOTYPE: **TU 90909**, from Arkansas, Marion Cnty., Buffalo R. at mouth of Rush Cr., 5 mi. E of Arkansas Hwy. 14, 12 May 1972, RCC 72-492, collected by R. C. Cashner and J. M. Humphries.

PARATYPES: **TU 78124**, 5 specimens collected with holotype; **TU 43520**, 2 specimens from Arkansas, Baxter Cnty., Backwater Slough, 1 mi. below mouth of Buffalo R. on White R. side, 29 July 1965, VII-WR-65-1A, collected by R. C. Cashner and crew; **TU 44085**, 8 specimens from Arkansas, Baxter Cnty., White R., 0.5 mi. up from Buffalo City, 27 July 1965, XVII-WR-65-1B, collected by R. C. Cashner and crew; **TU 45418**, 1 specimen from Arkansas, Buffalo R. (general collection number 4), 21 July 1965, XXXIII-WR-65-1B, collected by R. C. Cashner and crew; **TU 46559**, 2 specimens from Arkansas, Searcy Cnty., Buffalo R. 1 mi. down from U.S. Hwy. 65 bridge, 19 August 1965, XXXV-WR-65-1A, collected by R. C. Cashner and crew; **TU 46611**, 11 specimens from Arkansas, Marion Cnty., Buffalo R., 1.5 mi. up from launch, 6 August 1965, XXXVIII-WR-65-3A, collected by R. C. Cashner and crew (incorrectly listed as 6 specimens in original description); **TU 49574**, 1 specimen from Arkansas, Baxter Cnty., Buffalo R. 3 mi. above its mouth near Buffalo City, 29 July 1966, VII-WR-66-15A, collected by R. C. Cashner and crew; **TU 51019**, 1 specimen from Arkansas, Baxter Cnty., Buffalo R., just above second riffle from confluence with White R., 6 November 1965, BR-P-1L, collected by Brown and party; **TU 51231**, 1 specimen from Arkansas, Baxter Cnty., 150 yards above second riffle up Buffalo R. from mouth, right side, 5 March 1966, BR-P-1R, collected by Brown and party; **TU 52445**, 2 specimens from Arkansas, Baxter Cnty., just above second riffle up Buffalo R. from its mouth, left side facing upstream, 13 August 1966, BR-P-1L, collected

by Brown and party; **TU 52564**, 1 specimen from Arkansas, Baxter Cnty., just above second riffle up Buffalo R. from its mouth, left side facing upstream, 12 September 1966, BR-P-IL, collected by Brown and party.

Elassoma boehlkei Rohde & Arndt, 1987: 66.

PARATYPES: **TU 144145**, 10 specimens from North Carolina, Brunswick Cnty., Juniper Cr. at North Carolina Hwy. 1340, 1.6 km E of Makatoka, 17.8 km NW of Supply, 13 February 1984, collected by F. C. Rohde.

Elassoma okatie Rohde & Arndt, 1987: 77.

PARATYPES: **TU 144146**, 11 specimens from South Carolina, Jasper Cnty., Causeway Swamp Cr. on U.S. Hwy. 17, 9.9 km N of Hardeville, 19 March 1984, collected by F. C. Rohde, R. G. Arndt, and S. A. George.

Sparidae

Calamus nodosus Randall & Caldwell, 1966: 36.

PARATYPE: **TU 37765**, 1 specimen from Atlantic Ocean off Georgia Coast, 33°42'N, 77°11'W, 12-20 fms., 9 December 1959, Silver Bay Sta. 1507, collected by crew of M/V Silver Bay.

Percidae

Ammocrypta bifascia Williams, 1975: 8.

HOLOTYPE: **TU 82632**, from Florida, Holmes Cnty., Choctawhatchee R. approximately 1.5 mi. W of Pittman, Florida Hwy. 2, T5N, R16W, Sec. 9, 5 July 1973, collected by J. D. Williams.

PARATYPES: **TU 82633**, 25 specimens collected with holotype; **TU 2278**, 4 specimens from Florida, Holmes Cnty., tributary to Choctawhatchee R., 3.5 mi. NW of junction Florida Hwys. 79 and 177, 28 May 1951, RDS 2100, collected by R. D. Suttkus and party (missing); **TU 20405**, 1 specimen from Florida, Holmes Cnty., Wrights Cr., 6.4 mi. N of Bonifay, Florida Hwy. 177, 12 July 1959, RDS 2804, collected by R. D. Suttkus, D. Landwehr, and J. S. Suttkus; **TU 20816**, 8 specimens from Florida, Holmes Cnty., Choctawhatchee R., 3 mi. S of Browns, Florida Hwy. 2, 24 July 1959, RDS 2821, collected by R. D. Suttkus, J. M. Barkuloo, E. Grover, and K. Byrd; **TU 37399**, 2 specimens from Alabama, Coffee Cnty., Cripple Cr., tributary to Pea R. 1.1 mi. N of Kinston, Alabama Hwy. 189, 23 April 1965, RDS 3653, collected by R. D. Suttkus and F. L. Rose; **TU 46129**, 2 specimens from Florida, Holmes Cnty., Wrights Cr., 3.8 mi. N of junction of Florida Hwys. 79 and 177 on Florida Hwy. 177N, 1 May 1967, LMJ 67-47, collected by L. M. Jones and party; **TU 46435**, 1 specimen from Florida, Holmes Cnty., Wrights Cr., 6.9 mi. N of junction of Florida Hwy. 79 and U.S. Hwy. 90, on Florida Hwy. 79N, 30 April 1967, LMJ 67-46, collected by L. M. Jones and party; **TU 82174**, 1 specimen from Florida, Holmes Cnty., Pittman Cr. on Florida Hwy. 177A, 2 mi. N of Florida Hwy. 2, 17 May 1973, RCC 565, collected by D. C. Heins, J. M. Humphries, and R. C. Cashner.

Ammocrypta meridana Williams, 1975: 21.

PARATYPES: **TU 29137**, 1 specimen from Alabama, Bibb Cnty., Cahaba R. about 7 mi. NE of Centerville, Hwy. 27 crossing, 17-18 July 1962, RDS 3132, collected by R. D. Suttkus and W. T. Mason; **TU 29914**, 7 specimens from Alabama, Perry Cnty., Cahaba R. about 1 mi. W of Sprott, Alabama Hwy. 14 or 5 mi. E of Marion, 15 April 1963, RDS 3232, collected by R. D. Suttkus, J. S. Ramsey, and M. D. Dahlberg; **TU 30080**, 1 specimen from Alabama, Perry Cnty., Cahaba R. about 5 mi. E of Marion, Alabama Hwy. 14 or 1 mi. W of Sprott, 2 November 1963, RDS 3355, collected by R. D. Suttkus and J. S. Ramsey; **TU 32565**, 2 specimens from Alabama, Monroe Cnty., Limestone Cr., tributary to Alabama R. 3.3 mi. NW of Monroeville, Alabama Hwy. 41, 30 May 1964, RDS 3454, collected by R. D. Suttkus and J. S. Ramsey; **TU 32590**, 1 specimen from Alabama, Monroe Cnty., Robinson Cr., tributary to Flat Cr. 3.9 mi. N of Tunnel Springs, Alabama Hwy. 47, 30 May 1964, RDS 3455, collected by R. D. Suttkus and J. S. Ramsey; **TU 35115**, 1 specimen from Alabama, Perry Cnty., Cahaba R. 2 mi. SW of Sprott, 26 June 1964, RDS 3505, R. D. Suttkus and Environmental Biology class; **TU 40420**, 7 specimens from Alabama, Monroe Cnty., Flat Cr., tributary to Alabama R., 8.7 mi. NW of Monroeville, Alabama Hwy. 41, 9 April 1966, RDS 3862, collected by R. D. Suttkus and G. H. Clemmer; **TU 41702**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Evans Lower Bar, river mi. 133, 5 August 1966, RDS 3946, collected by R. D. Suttkus and G. E. Gunning; **TU 44436**, 23 specimens from Alabama, Monroe Cnty., Flat Cr., 8.6 mi. NW of Monroeville, Alabama Hwy. 41, 18 March 1967, RDS 4107, collected by R. D. Suttkus and Ichthyology class; **TU 44499**, 12 specimens from Alabama, Wilcox Cnty., Turkey Cr. 1.0 mi. S of Kimbrough, Alabama Hwy. 5, 18 March 1967, RDS 4108, collected by R. D. Suttkus and Ichthyology class; **TU 52497**, 1 specimen from Alabama, Perry-Dallas Cnty. line, 4.4 mi. N of junction of Alabama Hwys. 14 and 219 on Alabama Hwy. 219, 6 June 1968, collected by S. P. Marynick and M. C. Martin; **TU 52516**, 1 specimen from Alabama, Perry Cnty., Oakmulgee Cr., 9.9 mi. N of junction of Alabama Hwys. 14 and 219 on Alabama Hwy. 219, E 0.9 mi. on dirt road, 6 June 1968, collected by S. P. Marynick and M. C. Martin; **TU 53491**, 3 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.7, 24 September 1968, TMB 78, collected by G. E. Gunning and T. M. Berra; **TU 58622**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.7, 11 August 1969, BAT 69-84, collected by G. E. Gunning and B. A. Thompson; **TU 58708**, 1 specimen from Alabama, Monroe Cnty., Alabama R. at mouth of Limestone Cr., 14 August 1969, RDS 4594, collected by R. D. Suttkus and G. E. Gunning; **TU 64600**, 17 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.7, 24 September 1970, RDS 4846, collected by R. D. Suttkus and B. A. Thompson; **TU 65063**, 16 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.7, 27-28 August 1970, RDS 4822, collected by R. D. Suttkus and R. C. Cashner; **TU 65080**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.7, 28 August 1970, RDS 4824, collected by R. D. Suttkus and G. E. Gunning; **TU 69108**, 3 specimens from Alabama, Bibb Cnty., Cahaba R., 8.4 mi. NNE of Centerville, Hwy. 27, 9 April 1971, RDS 4976, collected by R. D. Suttkus and party; **TU 70627**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.7, 1 August 1971, RDS 5051, collected by R. D. Suttkus and R. C. Cashner; **TU 70639**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Tait Bar,

river mi. 122.4, 1 August 1971, RDS 5052, collected by R. D. Suttkus and R. C. Cashner; **TU 71602**, 6 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.7, 17 September 1971, RDS 5087, collected by R. D. Suttkus and B. A. Thompson; **TU 71616**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Evans Lower Bar, river mi. 133, 17 September 1971, RDS 5088, collected by R. D. Suttkus and B. A. Thompson; **TU 71646**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.4, 17 September 1971, RDS 5090, collected by R. D. Suttkus and B. A. Thompson; **TU 78624**, 1 specimen from Alabama, Monroe Cnty., Alabama R. just below Haines Island, river mi. 94.8, 15 August 1972, RDS 5297, collected by R. D. Suttkus and G. E. Gunning; **TU 78647**, 1 specimen from Alabama, Monroe Cnty., Alabama R. at mouth of Flat Cr., river mi. 81.5, 16 August 1972, RDS 5299, collected by R. D. Suttkus and G. E. Gunning; **TU 79017**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Evans Lower Bar, river mi. 133, 14 September 1972, RDS 5312, collected by R. D. Suttkus and B. A. Thompson (incorrectly listed as 79016 in description); **TU 79037**, 7 specimens from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.7, 14 September 1972, RDS 5311, collected by R. D. Suttkus and B. A. Thompson; **TU 79046**, 2 specimens from Alabama, Wilcox Cnty., Alabama R. at Yellow Jacket Bar, river mi. 129.7, 14 September 1972, RDS 5313, collected by R. D. Suttkus and B. A. Thompson; **TU 80065**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Evans Upper Bar, river mi. 135.7, 6 December 1972, RDS 5349, collected by R. D. Suttkus and R. C. Cashner; **TU 81501**, 1 specimen from Alabama, Wilcox Cnty., Alabama R. at Tait Bar, river mi. 122.4, 22 March 1973, RDS 5381, collected by R. D. Suttkus and party.

Etheostoma aquali Williams & Etnier, 1978: 464.

HOLOTYPE: **TU 105479**, from Tennessee, Bedford Cnty., Flat Cr., tributary to Duck R., at Tennessee Hwy. 64, 1 mi. SW of Shelbyville, 13 April 1967, collected by J. D. Williams and J. G. Armstrong.

PARATYPES: **TU 105480**, 1 specimen taken with holotype and cataloged as allotype; **TU 105481**, 3 specimens collected with holotype and cataloged as paratypes; **TU 32989**, 6 specimens from Tennessee, Bedford Cnty., Duck R. 13.4 mi. NW of Tullahoma, U.S. Hwy. 41A, 17 July 1964, JSR 64-72, collected by J. S. Ramsey and D. W. Walton (designated by Raney and Zorach (1967) and listed in Suttkus (1970) as paratypes of *Etheostoma microlepidum*); **TU 95729**, 1 specimen from Tennessee, Humphries Cnty., Duck R. just above mouth of Buffalo R., 10 September 1975, RDS 6024, collected by R. D. Suttkus and party.

Etheostoma blenniuss sequatchiense Burr, 1979: 198.

PARATYPE: **TU 33461**, 1 specimen from Tennessee, Sequatchie Cnty., Sequatchie R. 3.4 mi. S of Dunlap, U.S. Hwy. 127, 16 July 1964, JSR 64-67, collected by J. S. Ramsey and D.W. Walton.

Etheostoma boschungii Wall & Williams, 1974: 173.

HOLOTYPE: **TU 79424**, from Alabama, Lauderdale Cnty., Lindsey Cr. at junction Cnty. Rds. 15 and 6, 0.8 mi. N of Alabama Hwy. 20 at Central Heights, T1S, R12W, Sec. 3, 22 November 1969, collected by C. Gooch and J. D. Williams.

PARATYPES: **TU 79425**, 6 specimens collected with holotype; **TU 79426**, 6 specimens from Alabama, Madison Cnty., Copeland Branch, tributary to Briar Fork of Flint R., T1S, R1W, Sec. 26, 24 October 1970, collected by B. R. Wall and party; **TU 79427**, 15 specimens from Alabama, Lauderdale Cnty., Lindsey Cr. at junction Cnty. Rds. 15 and 6, 0.8 mi. N of Alabama Hwy. 20 at Central Heights, T1S, R12W, Sec. 3, 22 December 1971, collected by G. H. Clemmer and J. D. Williams.

Etheostoma brevirostrum Suttkus & Etnier, 1991: 15.

HOLOTYPE: **TU 158216**, from Alabama, Cleburne Cnty., Shoal Cr. at Pine Glen Recreation Area, 10 May 1989, RDS 9801, collected by R. D. Suttkus and J. M. Pierson.

PARATYPES: **TU 154765**, 6 specimens collected with holotype; **TU 56167**, 2 specimens from Alabama, Cleburne Cnty., Shoal Cr. at Pine Glen Recreation Area, 8.1 mi. N of Cleburne (U.S. Hwy. 78), 26 January 1969, RDS 4494, collected by R. D. Suttkus and B. A. Thompson; **TU 57896**, 1 specimen from Alabama, Calhoun Cnty., Shoal Cr. 2 mi. E of White Plains, 17 June 1969, RDS 4559, collected by R. D. Suttkus and J. S. Suttkus; **TU 59644**, 44 specimens from Alabama, Calhoun Cnty., Shoal Cr. tributary to Choccolocco Cr. on gravel road, 2.1 mi. E of White Plains, 14 October 1969, RDS 4641, collected by R. D. Suttkus, G. E. Gunning, B. A. Thompson, and R. C. Cashner; **TU 60351**, 5 specimens from Alabama, Cleburne Cnty., Shoal Cr. at Pine Glen Recreation Area, 8.1 mi. N of Cleburne (U.S. Hwy. 78), 16 October 1969, RDS 4648, collected by R. D. Suttkus, G. E. Gunning, B. A. Thompson, and R. C. Cashner; **TU 60687**, 2 specimens from Alabama, Calhoun Cnty., Shoal Cr. at Whitesides Mill, 7 mi. NE of Choccolocco, October 1966, collected by W. M. Howell; **TU 66257**, 5 specimens from Alabama, Calhoun Cnty., Shoal Cr. tributary to Choccolocco Cr., 2.3 mi. E of White Plains on gravel road, 15 December 1970, BAT 70-33, collected by G. E. Gunning and B. A. Thompson; **TU 66556**, 1 specimen from Alabama, Calhoun Cnty., Choccolocco Cr. at Alabama Hwy. 9 bridge, 1 mi. S of White Plains, 15 December 1970, BAT 70-332, collected by G. E. Gunning and B. A. Thompson; **TU 68585**, 3 specimens from Alabama, Calhoun Cnty., Shoal Cr. 2.3 mi. E of White Plains, 17 March 1971, BAT 71-359, collected by G. E. Gunning and B. A. Thompson; **TU 74352**, 1 specimen from Alabama, Calhoun Cnty., Shoal Cr., tributary to Choccolocco Cr., 2.3 mi. E of White Plains, 7 December 1971, RCC 71-459, collected by R. C. Cashner and G. E. Gunning; **TU 152214**, 2 specimens from Alabama, Cleburne Cnty., Shoal Cr. at Pine Glen Recreation Area, 13 May 1988, RDS 9580, collected by R. D. Suttkus.

Etheostoma chlorbranchium Zorach, 1972: 431.

PARATYPES: **TU 26212**, 25 specimens from North Carolina, Swain Cnty., Oconaluftee R. at Ela, U.S. Hwy. 19, 19 July 1962, RDS 3138, collected by R. D. Suttkus, J. S. Ramsey, and W. T. Mason.

Etheostoma collettei Birdsong & Knapp, 1969: 106.

PARATYPES: **TU 52876**, 5 specimens from Louisiana, Union Parish, Meridian Cr., 1 mi. E of Conway, T22N, R1E, Sec. 17, 21 May 1956, collected by W. R. Taylor and L. W. Lowe. (A series of 10 uncataloged paratypes, with the same data as CU 52108, were apparently lost in transit to Tulane University).

Etheostoma crossopterus Braasch & Mayden, 1985: 15.

PARATYPES: **TU 139109**, 2 specimens from Tennessee, Wilson Cnty., Stones Cr. at gravel road just off Interstate 40 (Mt. Juliet exit), 12 May 1973, collected by D. A. Etnier and party (removed from UT 91.838).

Etheostoma ditrema Ramsey & Suttkus, 1965: 66.

HOLOTYPE: **TU 35703**, from Georgia, Chattooga Cnty., a spring flowing into a tributary to Mills Cr., tributary to Chattooga R., 4.3 air mi. due W of Lyerly, 18 July 1962, RDS 3134, collected by R. D. Suttkus and W. T. Mason.

PARATYPES: **TU 29153**, 21 specimens collected with holotype; **TU 26086**, 8 specimens from Georgia, Chattooga Cnty., spring tributary to Mills Cr., tributary to Chattooga R., 5.3 mi. W of Lyerly, 19 April 1962, RDS 3052, collected by R. D. Suttkus, J. S. Ramsey, J. E. Thomerson, and C. D. Barbour; **TU 27566**, 9 specimens from Georgia, Chattooga Cnty., spring tributary to Mills Cr., tributary to Chattooga R., 5.3 mi. W of Lyerly, 30 May 1962, JSR 62-57, collected by J. S. Ramsey; **TU 32762**, 34 specimens from Georgia, Chattooga Cnty., spring tributary to Chattooga R. 5.3 mi. W of Lyerly, 1 June 1964, RDS 3466, collected by R. D. Suttkus and J. S. Ramsey (inadvertently omitted from first type list); **TU 32981**, 43 specimens from Georgia, Chattooga Cnty., spring tributary to Mills Cr., tributary to Chattooga R., 5.3 mi. W of Lyerly, 23 June 1964, RDS 3499, collected by R. D. Suttkus and Environmental Biology class.

Etheostoma etnieri Bouchard, 1977: 107.

HOLOTYPE: **TU 83147**, from Tennessee, White Cnty., Cherry Cr. at Tennessee Hwy. 84, 18 March 1972, collected by R. W. Bouchard, J. D. Way, F. L. Oakberg, and B. E. Oakberg.

PARATYPES: **TU 83148**, 1 specimen collected with holotype and cataloged as allotype; **TU 83149**, 11 specimens collected with holotype and cataloged as paratypes; **TU 30316**, 2 specimens from Tennessee, Van Buren Cnty., Rocky R. 15 mi. E of McMinnville, Tennessee Hwy. 30, 11 April 1963, RDS 3220, collected by R. D. Suttkus, J. S. Ramsey, and M. D. Dahlberg; **TU 33451**, 1 specimen from Tennessee, Van Buren Cnty., Caney Cr., tributary to Caney Fork 5.4 mi. E of Spencer, Tennessee Hwy. 30, 16 July 1964, JSR 64-66, collected by J. S. Ramsey and D. W. Walton; **TU 33479**, 5 specimens from Tennessee, Warren Cnty., Collins R. 5.7 mi. ESE of McMinnville, Tennessee Hwy. 8, 17 July 1964, JSR 64-68, collected by J. S. Ramsey and D. W. Walton; **TU 83150**, 81 specimens from Tennessee, White Cnty., Wildcat Cr. at Cnty. Rd. 4396 off Tennessee Hwy. 84, E of Sparta, 7 October 1972, collected by J. Dewees.

Etheostoma flavum Etnier & Bailey, 1989: 3.

PARATYPES: **TU 30312**, 66 specimens from Tennessee, Coffee Cnty., Duck R. 2 mi. NW of Manchester, U.S. Hwy 41, 11 April 1963, RDS 3219, collected by R. D. Suttkus, J. S. Ramsey, and M. D. Dahlberg; **TU 139774**, 15 specimens from Tennessee, Houston Cnty., Big Richland Cr. at unnumbered gravel road, 5.8 km N of Waverly, 12 September 1981, collected by D. A. Etnier and party.

Etheostoma microlepidum Raney & Zorach, 1967: 94.

PARATYPES: **TU 19479**, 19 specimens from Tennessee, Rutherford Cnty., East Fork of Stones R., 6 mi. N of Murfreesboro, U.S. Hwy. 231, 7 September

1958, RDS 2758, collected by R. D. Suttkus and M. Andersson; **TU 32983**, 71 specimens from Tennessee, Cheatham Cnty., Harpeth R., 8 mi. E of White Bluff, U.S. Hwy. 70, 15 July 1964, JSR 64-60, collected by J. S. Ramsey and D. W. Walton.

Etheostoma moorei Raney & Suttkus, 1964: 131.

PARATYPES: **TU 22697**, 41 specimens from Arkansas, Cleburne Cnty., Devils Fork, Little Red R. between Stark and Edgemont, Arkansas Hwy. 16, 23 October 1959, RDS 2852, collected by R. D. Suttkus, M. Andersson, and B. I. Sundararaj; **TU 26227**, 22 specimens from Arkansas, Van Buren Cnty., Middle Fork, Little Red R. at Shirley, 17 August 1962, RDS 3157, collected by R. D. Suttkus and W. T. Mason; **TU 26249**, 21 specimens from Arkansas, Van Buren Cnty., South Fork, Little Red R., 9 mi. SW of Clinton, Arkansas Hwy. 95, 17 August 1962, RDS 3158, collected by R. D. Suttkus and W. T. Mason.

Etheostoma neopterum Howell & Dingerkus, 1978: 14.

PARATYPES: **TU 102024**, 7 specimens from Alabama, Lauderdale Cnty., small tributary to Little Butler Cr., about 2 mi. W of Pruittton, 3 April 1976, GD-AL-27-76, collected by G. Dingerkus, W. M. Howell, and A. Black.

Etheostoma nigripinne Braasch & Mayden, 1985: 28.

PARATYPES: **TU 139110**, 3 specimens from Tennessee, Decatur Cnty., Whites Cr., 4 mi. N of Bath Springs, 4 April 1978, collected by M. E. Braasch (removed from KU 20895).

Etheostoma nuchale Howell & Caldwell, 1965: 101.

PARATYPES: **TU 34591**, 20 specimens from Alabama, Jefferson Cnty., Glen Spring at Bessemer, T19S, R4W, Sec. 17, NE 1/4, along Cnty. Hwy. 20, 9 September 1964, RDS 3582, collected by R. D. Suttkus, J. S. Ramsey, and F. L. Rose.

Etheostoma olivaceum Braasch & Page, 1979: 2.

PARATYPES: **TU 101391**, 6 specimens from Tennessee, Putnam Cnty., Rock Springs Branch, 2 km N of Buffalo Valley, 11 December 1976, collected by B. M. Burr and L. M. Page (removed from INHS 75576).

Etheostoma pyrrhogaster Bailey & Etnier, 1988: 31.

PARATYPES: **TU 139772**, 4 specimens from Tennessee, Henry Cnty., Clear Cr., tributary to North Fork Obion R., at unnumbered cnty. rd., 1.7 air mi. S of Cnty. Rd. 8172, 3.2 air mi. SW of Puryear, 27 April 1972, collected by J. E. Deck, W. C. Dickinson, and J. Vaughn.

Etheostoma radiosum cyanorum Moore & Rigney, 1952: 10.

PARATYPES: **TU 10564**, 9 specimens from Oklahoma, Johnston Cnty., Blue R. at bridge, Oklahoma Hwy. 99, 14 June 1959, collected by G. A. Moore (formerly OAM (OSUS) 2913).

Etheostoma rubrum Raney & Suttkus, 1966: 95.

PARATYPES: **TU 30171**, 47 specimens from Mississippi, Copiah Cnty., Bayou Pierre, 8.6 mi. SW of Utica, Mississippi Hwy. 18, 7 December 1963, JSR 63-58, collected by J. S. Ramsey and M. D. Dahlberg; **TU 31341**, 2 specimens from Mississippi, Hinds Cnty., White Oak Cr., tributary to Bayou Pierre, 2.7 mi. S of Utica, Mississippi Hwy. 18, 1 February 1964, RDS 3378, collected by E. C. Raney and R. D. Suttkus; **TU 32264**, 11 specimens from Mississippi, Copiah Cnty., Bayou Pierre 18.7 mi. ENE of Port Gibson, Hwy. 18, 17 May 1964, RDS 3435, collected by R. D. Suttkus and J. S. Ramsey (inadvertently omitted from Suttkus (1970)); **TU 37305**, 4 specimens from Mississippi, Copiah Cnty., Bayou Pierre, 8.6 mi. SW of Utica, Mississippi Hwy. 18, 18 March 1965, RDS 3643, collected by R. D. Suttkus and L. Ogren; **TU 37451**, 53 specimens from Mississippi, Copiah Cnty., Bayou Pierre, 8.6 mi. SW of Utica, Mississippi Hwy. 18, 28 April 1965, RDS 3661, collected by R. D. Suttkus and F. L. Rose; **TU 40368**, 10 specimens from Mississippi, Copiah Cnty., Bayou Pierre, 8.6 mi. SW of Utica, Mississippi Hwy. 18, 2 April 1966, RDS 3855, collected by R. D. Suttkus and G. H. Clemmer.

Etheostoma smithi Page & Braasch, 1976: 2.

PARATYPES: **TU 95964**, 13 specimens from Kentucky, Livingston Cnty., Ferguson Cr., 3 km E of Smithland, 27 May 1971, collected by L. J. Stannard and L. M. Page.

Etheostoma striatulum Page & Braasch, 1977: 1.

PARATYPES: **TU 97493**, 10 specimens from Tennessee, Bedford Cnty., Wartrace Cr., 1 mi. E of Bell Buckle, 7 November 1975, collected by L. M. Page and M. E. Braasch (removed from INHS 75037).

Etheostoma tallapoosae Suttkus & Etnier, 1991: 3.

HOLOTYPE: **TU 158215**, from Alabama, Elmore Cnty., Gold Branch, tributary to Channahatchee Cr., 6 mi. N of Eclectic, Alabama Hwy. 63, 16 March 1957, RDS 2592, collected by R. D. Suttkus, R. J. Miller, H. V. Miller, and J. DeAbate.

PARATYPES: **TU 15275**, 92 specimens collected with holotype; **TU 12084**, 4 specimens from Alabama, Elmore Cnty., Gold Branch, 6 mi. NE of Eclectic, Alabama Hwy. 63, 5 October 1955, RDS 2525, collected by R. D. Suttkus; **TU 29891**, 30 specimens from Alabama, Clay Cnty., Enitachope Cr., tributary to Hillabee Cr., 3.2 mi. SW of Ashland, Hwy. 9, 21 September 1963, JSR 63-46, collected by J. S. Ramsey; **TU 32737**, 21 specimens from Alabama, Clay Cnty., Enitachope Cr. 2.9 mi. S of Ashland, Alabama Hwy. 9, 1 June 1964, RDS 3462, collected by R. D. Suttkus and J. S. Ramsey; **TU 40656**, 57 specimens from Alabama, Clay Cnty., Enitachope Cr., tributary to Hillabee Cr., 2.9 mi. SW of Ashland, Alabama Hwy. 9, 13 April 1966, RDS 3877, collected by R. D. Suttkus and G. E. Gunning; **TU 41116**, 45 specimens from Alabama, Elmore Cnty., Gold Branch, tributary to Channahatchee Cr., 6 mi. N of Eclectic, Alabama Hwy. 63, 12 April 1966, RDS 3873, collected by R. D. Suttkus and G. H. Clemmer; **TU 41137**, 3 specimens from Alabama, Elmore Cnty., Channahatchee Cr., tributary

to Tallapoosa R., 2.5 mi. S of Red Hill, Alabama Hwy. 229, 12 April 1966, RDS 3874, collected by R. D. Suttkus and G. H. Clemmer; **TU 41160**, 12 specimens from Alabama, Clay Cnty., Hillabee Cr., tributary to Tallapoosa R., 1 mi. SW of Millerville, Alabama Hwy. 9, 13 April 1966, RDS 3876, collected by R. D. Suttkus and G. H. Clemmer; **TU 152230**, 7 specimens from Alabama, Elmore Cnty., Gold Branch, 0.9 mi. NW of Jordon, Alabama Hwy. 63, 14 May 1988, RDS 9581, collected by R. D. Suttkus; **TU 152243**, 15 specimens from Alabama, Elmore Cnty., Gold Branch, 1.7 mi. SE of Jordon, T20N, R21E, Sec. 29, 14 May 1988, RDS 9582, collected by R. D. Suttkus; **TU 157616**, 1 specimen from Alabama, Tallapoosa Cnty., Josie Leg Cr., 3.9 mi. SW of Perryville, Hwy. 22, 23 March 1990, RDS 10050, collected by R. D. Suttkus and J. M. Pierson; **TU 157633**, 11 specimens from Alabama, Elmore Cnty., Gold Branch, 6 mi. N of Eclectic, Alabama Hwy. 63, 23 March 1990, RDS 10051, collected by R. D. Suttkus and J. M. Pierson; **TU 157646**, 18 specimens from Alabama, Elmore Cnty., Gold Branch at Cnty. Rd. 357, 1.7 mi. SE of Alabama Hwy. 63 at Jordon, 23 March 1990, RDS 10052, collected by R. D. Suttkus and J. M. Pierson; **TU 157781**, 2 specimens from Alabama, Clay Cnty., Enitachope Cr., 2.8 mi. SSW of Ashland, Alabama Hwy. 9, 12 April 1990, RDS 10063, collected by R. D. Suttkus and J. M. Pierson; **TU 157793**, 19 specimens from Alabama, Elmore Cnty., Gold Branch 1.8 mi. E of Alabama Hwy. 63, 12 April 1990, RDS 10064, collected by R. D. Suttkus and J. M. Pierson; **TU 157803**, 4 specimens from Alabama, Elmore Cnty., Gold Branch, 6 mi. N of Eclectic, Alabama Hwy. 63, 12 April 1990, RDS 10065, collected by R. D. Suttkus and J. M. Pierson; **TU 158249**, 8 specimens from Alabama, Coosa Cnty., Oakachoy Cr. at Alabama Hwy. 259, T21N, R20E, Sec. 2, 9 August 1988, MP 88-79, collected by J. M. Pierson and C. Stephenson.

Etheostoma wapiti Etnier & Williams, 1989: 989.

PARATYPES: **TU 30271**, 1 specimen from Tennessee, Lincoln Cnty., Elk R. at Fayetteville, 0.25 mi. below U.S. Hwy. 231, 11 April 1963, RDS 3217, collected by R. D. Suttkus, J. S. Ramsey, and M. D. Dahlberg (missing); **TU 148010**, 2 specimens from Tennessee, Giles Cnty., Richland Cr. at Cnty. Rd. 4209 crossing, 11.2 air mi. SSE of Pulaski, 7 June 1982, collected by D. A. Etnier.

Etheostoma zonistium Bailey & Etnier, 1988: 39.

PARATYPES: **TU 139773**, 7 specimens from Tennessee, Hardin Cnty., Walker Branch, tributary to Mud Cr. at unnumbered cnty. rd., 3.1 air mi. SSW of Savannah, 16 May 1978, collected by D. A. Etnier and party.

Percina antesella Williams & Etnier, 1977: 7.

HOLOTYPE: **TU 94031**, from Tennessee, Bradley Cnty., Conasauga R. at Tennessee Hwy. 75, 12.9 mi. SE of Cleveland, 9-10 April 1970, collected by D. A. Etnier and party.

PARATYPES: **TU 58938**, 7 specimens from Tennessee, Bradley Cnty., Conasauga R. at Tennessee Hwy. 75, 12.9 mi. SE of Cleveland, 17 October 1969, RDS 4657, collected by R. D. Suttkus, B. A. Thompson, and R. C. Cashner; **TU 58968**, 3 specimens from Tennessee, Bradley Cnty., Conasauga R. at Tennessee Hwy. 75, 12.9 mi. SE of Cleveland, 19 October 1969, RDS 4660, collected by R. D. Suttkus, B. A. Thompson, and R. C. Cashner; **TU 59427**, 7 specimens from

Georgia, Murray Cnty., Conasauga R. 2.3 mi. W of junction Georgia Hwys. 225 and 286 on Georgia Hwy. 286, 19 October 1969, RDS 4661, collected by R. D. Suttkus, B. A. Thompson, and R. C. Cashner; **TU 65937**, 7 specimens from Tennessee, Bradley Cnty., Conasauga R. at Tennessee Hwy. 75, 12.9 mi. SE of Cleveland, 29 June 1970, RDS 4777, collected by R. D. Suttkus and R. C. Cashner; **TU 69143**, 8 specimens from Tennessee, Bradley Cnty., Conasauga R. at Tennessee Hwy. 75, 12.9 mi. SE of Cleveland, 15 April 1971, RDS 4989, collected by R. D. Suttkus and R. C. Cashner; **TU 78368**, 1 specimen from Tennessee, Bradley Cnty., Conasauga R. at Tennessee Hwy. 75, 12.9 mi. SE of Cleveland, 1 July 1972, BAT 72-451, collected by B. A. Thompson, D. A. Etnier, and University of Tennessee graduate students.

Percina aurolineata Suttkus & Ramsey, 1967: 129.

HOLOTYPE: **TU 39573**, from Georgia, Gilmer Cnty., Coosawattee R. about 200 yards below the mouth of a small spring tributary, 4.2 mi. SW of the center of Ellijay, 18 June 1966, RDS 3910, collected by R. D. Suttkus and Environmental Biology class.

PARATYPES: **TU 41049**, 3 specimens collected with holotype; **TU 38320**, 5 specimens from Georgia, Gilmer Cnty., Cartecay R., tributary to Coosawattee R., 2.9 mi. SE of Ellijay, along Georgia Hwy. 52, 18 June 1965, RDS 3695, collected by R. D. Suttkus and Environmental Biology class; **TU 38507**, 15 specimens from Georgia, Gilmer Cnty., Coosawattee R., 4.2 mi. SW of Ellijay, 22 June 1965, RDS 3707, collected by R. D. Suttkus and Environmental Biology class; **TU 40714**, 4 specimens from Georgia, Gilmer Cnty., tributary to Cartecay R., 2.9 mi. SE of Ellijay, along Georgia Hwy. 52, 15 April 1966, RDS 3881, collected by R. D. Suttkus and G. H. Clemmer; **TU 41053**, 6 specimens from Georgia, Gilmer Cnty., Cartecay R., 3.1 mi. SE of Ellijay, along Georgia Hwy. 52, 17 June 1966, RDS 3909, collected by R. D. Suttkus, G. H. Clemmer, and Environmental Biology class.

Percina caprodes fulvitaenia Morris & Page, 1981: 96.

PARATYPES: **TU 110587**, 2 specimens from Missouri, Osage Cnty., Maries R., 2 km S of Westphalia, 11 October 1969, collected by P. W. Smith and L. M. Page (removed from INHS 75634).

Percina gymnocephala Beckham, 1980: 1.

HOLOTYPE: **TU 106911**, from North Carolina, Ashe Cnty., South Fork of New R. at E crossing of Cnty. Rd. 1181, 7.0 air mi. SE of West Jefferson, 22 September 1977, ECB 344, collected by E. C. Beckham and E. B. Beckham.

PARATYPES: **TU 105137**, 3 specimens from North Carolina, Ashe Cnty., South Fork of New R. at E crossing of Cnty. Rd. 1181, 7.0 air mi. SE of West Jefferson, 22 September 1977, ECB 344, collected by E. C. Beckham and E. B. Beckham; **TU 70059**, 3 specimens from Virginia, Grayson Cnty., Fox Cr. along Cnty. Rd. 711, 1.4 mi. above Fox, junction Cnty. Rd. 711 and U.S. Hwy. 58, 13 June 1971, BAT 71-379, collected by B. A. Thompson and K. Thompson; **TU 70102**, 12 specimens from Virginia, Grayson Cnty., Fox Cr. at U.S. Hwy. 58 bridge, 3.0 mi. NE of [town of] Mouth Of Wilson, 12 June 1971, BAT 71-377,

collected by B. A. Thompson and K. Thompson; **TU 71144**, 3 specimens from Virginia, Grayson Cnty., Fox Cr. along Cnty. Rd. 711, 1.2 mi. NW of Fox (U.S. Hwy. 58), 13 June 1971, BAT 71-381, collected by B. A. Thompson and K. Thompson; **TU 105084**, 2 specimens from Virginia, Grayson Cnty., Fox Cr. at U.S. Hwy. 58, 3 mi. E of [town of] Mouth Of Wilson, 20 September 1977, ECB 339, collected by E. C. Beckham and E. B. Beckham; **TU 105124**, 1 specimen from North Carolina, Ashe Cnty., South Fork of New R. at North Carolina Hwy. 163, 7.5 air mi. SE of West Jefferson, 22 September 1977, ECB 343, collected by E. C. Beckham and E. B. Beckham; **TU 106912**, 2 specimens from North Carolina, Ashe Cnty., South Fork of New R. at Cnty. Rd. 1105 bridge, 0.1 mi. S of Cnty. Rd. 1106, 24 March 1978, HLB 18, collected by H. L. Bart, R. Holzenthal, J. M. Grady, and G. Laiche.

Percina jenkinsi Thompson, 1985: 4.

HOLOTYPE: **TU 106075**, from Tennessee, Bradley Cnty., Conasauga R. at Tennessee Hwy. 74 bridge, 12.6 mi. SE of Cleveland, 1 July 1972, BAT 72-451, collected by B. A. Thompson, D. A. Etnier, and University of Tennessee graduate students.

PARATYPES: **TU 78370**, 2 specimens collected with holotype (incorrectly listed as TU 78369 in original description); **TU 69140**, 6 specimens from Tennessee, Bradley Cnty., Conasauga R., 12.6 mi. SE of Cleveland, Tennessee Hwy. 74, 15 April 1971, RDS 4989, collected by R. D. Suttkus and R. C. Cashner; **TU 80506**, 1 specimen from Tennessee, Bradley Cnty., Conasauga R., 12.9 mi. SE of Cleveland, Tennessee Hwy. 74, 29 June 1970, RDS 4777, collected by R. D. Suttkus and R. C. Cashner; **TU 80507**, 6 specimens from Tennessee, Bradley Cnty., Conasauga R., 12.7 mi. SE of Cleveland, Tennessee Hwy. 74, 17 October 1969, RDS 4657, collected by R. D. Suttkus, B. A. Thompson, and R. C. Cashner; **TU 80508**, 8 specimens from Tennessee, Bradley Cnty., Conasauga R., 12.7 mi. SSE of Cleveland, Tennessee Hwy. 74, 19 October 1969, RDS 4660, collected by R. D. Suttkus, B. A. Thompson, and R. C. Cashner.

Percina lenticula Richards & Knapp, 1964: 695.

PARATYPES: **TU 15291**, 7 specimens from Alabama, Bibb Cnty., Cahaba R., 2.2 mi. N of Centerville, just off Alabama Hwy. 5, 17 May 1957, RDS 2594, collected by R. D. Suttkus, R. J. Miller, H. V. Miller, and J. DeAbate.

Percina tanasi Etnier, 1976: 473.

HOLOTYPE: **TU 90858**, from Tennessee, Loudon Cnty., Little Tennessee R. at shoal area out from mouth of Coytee Springs, 6 November 1973, BAT 73-564, collected by B. A. Thompson, D. A. Etnier, W. C. Starnes, G. F. Boronow, B. F. Clark, and R. L. Hensen.

PARATYPES: **TU 83994**, 2 specimens collected with holotype; **TU 90859**, 1 specimen from Tennessee, Loudon Cnty., Little Tennessee R. at shoal area out from mouth of Coytee Springs, 6 November 1973, BAT 73-564, collected by B. A. Thompson, D. A. Etnier, W. C. Starnes, G. F. Boronow, B. F. Clark, and R. L. Hensen.

Poeciliichthys whipplii radiosus Hubbs & Black, 1941: 10. (elevated to *Etheostoma radiosum* by Moore and Rigney, 1952)

PARATYPES: **TU 52871**, 1 specimen from Arkansas, Garland Cnty., North Fork, Ouachita R., 2.5 mi. W of Buckville, 1 June 1939, collected by T. Holder; **TU 52872**, 5 specimens from Arkansas, Garland Cnty., Cataract Branch, 2.75 mi. N of Cedar Glade, 2 May 1939, collected by T. Holder; **TU 52873**, 2 specimens from Arkansas, Garland Cnty., Big Branch, 2.25 mi. W of Buckville, 16 May 1939, collected by T. Holder. (These eight paratypes apparently had been retained at the University of Arkansas by John D. Black subsequent to the description. During 1967, a large part of the University of Arkansas fish collection was given to Tulane University and thus the transfer of the type material).

Lutjanidae

Symphysanodon berryi Anderson, 1970: 338.

PARATYPES: **TU 57443**, 2 specimens from Atlantic Ocean, 20°45'N, 73°33'W, 217-200 fms., 24 May 1965, Oregon Sta. 5414, collected by crew of M/V Oregon (removed from series of 43 specimens from same station as holotype).

Cichlidae

Cichlasoma pantostictum Taylor & Miller, 1983: 15.

PARATYPES: **TU 5640**, 3 specimens from Tamaulipas, México, Laguna de Chairel at the mouth of Río Tamesi at Tampico, 29 December 1952, RMD X-23, collected by J. H. Darnell and E. Liner.

Clinidae

Starksia y-lineata Gilbert, 1965: 2.

PARATYPES: **TU 36401**, 2 specimens from Caribbean Sea, Grand Cayman Island, "Ironshore" formation in front of Seaview Lodge, S side of Georgetown, depth 2-12 ft., collected by C. R. Gilbert and J. C. Tyler.

Microdesmidae

Microdesmus carri Gilbert, 1966: 326.

PARATYPES: **TU 36400**, 2 specimens from Atlantic Ocean, Costa Rica, Limon Province, E side of Tortuguero Lagoon, near mouth, 7 August 1964, collected by D. P. Kelso (removed from UF 11297).

Microdesmus suttkusi Gilbert, 1966: 329.

HOLOTYPE: **TU 25110**, from Costa Rica, Puntarenas Province, Boca de Río Baru at Dominical, 28 January 1961, RDS 2961, collected by R. D. Suttkus, A. Smalley, and party.

PARATYPES: **TU 25130**, 1 specimen from Costa Rica, Puntarenas Province, Río Baru, 1 km N of Dominical, 28 January 1961, RDS 2962, collected by R. D.

Suttkus, A. Smalley, and party; **TU 25262**, 1 specimen from Costa Rica, Puntarenas Province, at La Barca, 27 February 1960, collected by S. Jimenez-C.

Fierasferidae (= Carapidae)

Echiodon dawsoni Williams & Shipp, 1982: 846.

PARATYPES: **TU 122841**, 2 specimens from Gulf of Mexico, 29°39.8'N, 87°16.2'W, 75.6 m, 7 February 1978, collectors unknown (removed from USAIC 6006).

Draconettidae

Draconetta oregona Briggs & Berry, 1959: 129.

PARATYPES: **TU 18831**, 3 specimens from Atlantic Ocean, 02°04'N, 47°00'W, 125 fms., 17 November 1957, Oregon Sta. 2080, collected by crew of M/V Oregon (incorrectly listed as TU 188831 in description) (removed from series collected with holotype).

Gobiidae

Gobiosoma evelynae Böhlke & Robins, 1968: 103.

PARATYPES: **TU 48782**, 2 specimens from Atlantic Ocean, Virgin Islands, Anguilla Island, Dowlings Shoal, W of Crocus Bay off N end of Sand Island, 17 July 1965, collected by J. C. Tyler and W. N. Eschmeyer (formerly ANSP 110549).

Gobiosoma genie Böhlke & Robins, 1968: 109.

PARATYPES: **TU 48781**, 1 specimen from Atlantic ocean, Bahama Islands, Hog Island, north shore (station 122), 15 March 1953, collected by C. C. G. Chaplin.

Triglidae

Bellator ribeiroi Miller, 1965: 259.

PARATYPES: **TU 37821**, 2 specimens from Atlantic Ocean off Colombia, 08°50.5'N, 76°53.5'W, 37-40 fms., 27 May 1964, Oregon Sta. 4899, collected by crew of M/V Oregon.

Peristedion greyae Miller, 1967: 27.

PARATYPES: **TU 33302**, 2 specimens from Atlantic Ocean off North Carolina, 34°15'N, 75°54'W, 190-200 fms., 9 June 1962, Silver Bay Sta. 4159, collected by crew of M/V Silver Bay.

Cottidae

Cottus carolinae infernalis Williams & Robins, 1970: 371.

PARATYPES: **TU 32497**, 5 specimens from Alabama, Clarke Cnty., Big

Reedy Cr., tributary to Alabama R., 7 mi. NE of Carlton, 28 May 1964, RDS 3450, collected by R. D. Suttkus and J. S. Ramsey.

Cottus pygmaeus Williams, 1968: 334.

PARATYPES: **TU 34396**, 47 specimens from Alabama, Calhoun Cnty., Coldwater Cr., just below Coldwater Springs at town of Coldwater, 31 August 1964, RDS 3571, collected by R. D. Suttkus and J. S. Ramsey.

Tetraodontidae

Sphoeroides parvus Shipp & Yerger, 1969: 478.

PARATYPES: **TU 9381**, 1 specimen from Louisiana, St. Tammany Parish, Lake Ponchartrain, 2 mi. W of south drawbridge of Louisville and Nashville Railroad, 30°10'N, 89°55'W, 5 November 1954, M/V Anna Inez Station 547, collected by R. D. Suttkus and party; **TU 19038**, 2 specimens from Louisiana, Cameron Parish, at jetties along west bank of Calcasieu R. at Cameron, 28 April 1957, RFS 7, collected by R. F. Smith and M. Guidry; **TU 22573**, 14 specimens from Louisiana, Jefferson Parish, Gulf of Mexico, 100 yards off Grand Terre Island near Grand Isle, 12 December 1959, collected by D. Landwehr and R. D. Lumsden.

Batrachoididae

Porichthys bathoiketes Gilbert, 1968: 710.

PARATYPES: **TU 18572**, 9 specimens from Atlantic Ocean, 11°27'N, 83°11'W, 135 fms., 9 September 1957, Oregon Sta. 1902, collected by crew of M/V Oregon; **TU 18573**, 1 specimen from Atlantic Ocean, 16°07'N, 81°05'W, 130 fms., 24 August 1957, Oregon Sta. 1891, collected by crew of M/V Oregon; **TU 18574**, 3 specimens from Atlantic Ocean, 16°38'N, 81°39'W, 150 fms., 22 August 1957, Oregon Sta. 1879, collected by crew of M/V Oregon; **TU 19928**, 2 specimens from Atlantic Ocean, 16°39'N, 81°43'W, 125 fms., 22 August 1957, Oregon Sta. 1878, collected by crew of M/V Oregon.

Lophiidae

Lophiodes bruchius Caruso, 1981: 539.

PARATYPES: **TU 94331**, 3 specimens from Hawaii, Pacific Ocean, 21°03.5'N, 156°29.1'W, 274-318 m, 25 November 1968, TC 40-92, collected by crew of R/V Townsend Cromwell; **TU 94332**, 2 specimens from Hawaii, Pacific Ocean, 21°04.5'N, 156°27.5'W, 337-340 m, 22 November 1968, TC 40-74, collected by crew of R/V Townsend Cromwell.

Lophiodes reticulatus Caruso & Suttkus, 1979: 491.

PARATYPES: **TU 2733**, 1 specimen from Gulf of Mexico, 29°49'N, 85°45'W, 112 fms., 24 February 1950, Oregon Sta. 278, collected by crew of M/V Oregon; **TU 90215**, 1 specimen from Gulf of Mexico, 29°15.7'N, 88°09'W, 70 fms., 3 May 1973, JHC 73-344, collected by crew of R/V Oregon II cruise 45 and J. H. Caruso; **TU 94027**, 3 specimens from Gulf of Mexico, 28°47'N, 85°19'W, 64 fms., 7 March 1953, Oregon Sta. 895, collected by crew of M/V Oregon.

Chaunacidae

Chaunax suttkusi Caruso, 1989: 160.

PARATYPES: **TU 2811**, 2 specimens from Gulf of Mexico, 29°20'N, 87°25'W, 315 fms., 28 April 1951, Oregon Sta. 319, collected by crew of M/V Oregon; **TU 10947**, 5 specimens from Gulf of Mexico, 24°20'N, 83°24'W, 180 fms., 13 April 1954, Oregon Sta. 1007, collected by crew of M/V Oregon; **TU 12660**, 12 specimens from Gulf of Mexico, 26°24'N, 83°45'W, 210 fms., 19 June 1956, Oregon Sta. 1556, collected by crew of M/V Oregon; **TU 35837**, 6 specimens from Gulf of Mexico, 24°28'N, 83°27'W, 205 fms., 6 August 1963, Oregon Sta. 4371, collected by crew of M/V Oregon and M. D. Dahlberg; **TU 90284**, 1 specimen from Gulf of Mexico, 29°16.1'N, 87°38'W, 250 fms., 4 May 1973, JHC 73-348, collected by crew of R/V Oregon II cruise 45 and J. H. Caruso; **TU 90324**, 2 specimens from Gulf of Mexico, 29°14.5'N, 87°44'W, 270 fms., 5 May 1973, JHC 73-351, collected by crew of R/V Oregon II cruise 45 and J. H. Caruso; **TU 90381**, 1 specimen from Gulf of Mexico, 29°01.8'N, 88°14.9'W, 400 fms., 6 May 1973, JHC 73-356, collected by crew of R/V Oregon II cruise 45 and J. H. Caruso; **TU 90461**, 2 specimens from Gulf of Mexico, 24°28.7'N, 83°32.5'W, 200 fms., 21 May 1973, JHC 73-371, collected by crew of R/V Oregon II cruise 45 and J. H. Caruso; **TU 90473**, 1 specimen from Gulf of Mexico, 24°23.4'N, 83°24.1'W, 220 fms., 21 May 1973, JHC 73-372, collected by crew of R/V Oregon II cruise 45 and J. H. Caruso.

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